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CONSTRUCTION ENGINEERING RESEARCH LAB (ARMY) CHAMPAI--ETC F/G 13/2  
A SYSTEMS APPROACH TO CONSTRUCTION OF RECREATIONAL AREA FACILIT--ETC(U)  
MAR 77 E J WORREL

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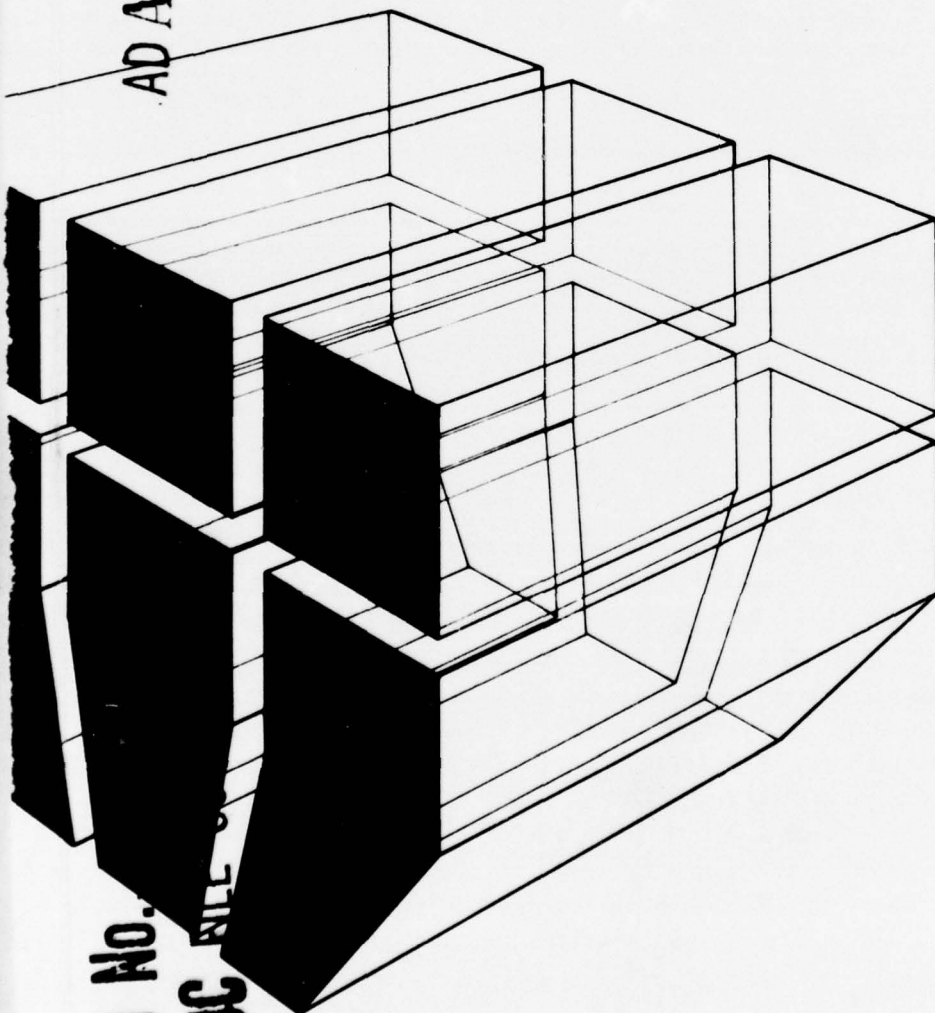
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TECHNICAL REPORT D-76  
March 1977

AD A 038594

A SYSTEMS APPROACH TO CONSTRUCTION  
OF RECREATIONAL AREA FACILITIES

VOLUME II: REQUEST FOR TECHNICAL PROPOSAL  
AND EVALUATION DOCUMENTATION



by  
Edward J. Worrel



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|---|---|--|
| 1. REPORT NUMBER<br>CERL-TR-D-76-101-2  | 2. GOVT ACCESSION NO.                             | 3. RECIPIENT'S CATALOG NUMBER  |
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| 18. SUPPLEMENTARY NOTES<br>Copies are obtainable from National Technical Information Service<br>Springfield, VA 22151   |   |  |
| 19. KEY WORDS (Continue on reverse side if necessary and identify by block number)<br>industrialized sanitary facilities<br>Request for Technical Proposal<br>evaluation documentation  |   |  |
| 20. ABSTRACT (Continue on reverse side if necessary and identify by block number)<br>This is the second volume of a two-volume report describing a program conducted by the U.S. Army Construction Engineering Research Laboratory in conjunction with the U.S. Army Engineer Division, Ohio River, for the procurement of 78 industrialized sanitary facilities. Volume I describes the methodology followed during the course of this program and includes the procurement performance and program implementation procedures. This volume contains the Request for Technical Proposal |   |  |

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Step-One documentation (which includes the Performance Specification for Sanitary Facilities), and the evaluation documentation used by the Evaluation Board to evaluate the submitted proposals, and Step-Two documentation (excluding wage rates per county for potential laborers involved in the program).



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## FOREWORD

This research was conducted for the Civil Works Directorate, Office of the Chief of Engineers (OCE), under reimbursable order number CWIS 31104. The OCE technical monitors were Mr. Lucien Guthrie and Mr. George Gibson.

The work was performed by the Master Planning and Systems Building Branch, Habitability and Planning Division, U.S. Army Construction Engineering Research Laboratory (CERL), Champaign, IL. The CERL principal investigator was Mr. Edward J. Worrel.

Dr. D. Gordon Bagby is the Chief of the Master Planning and Systems Building Branch. Dr. Robert M. Dinnat is Chief of the Habitability and Planning Division. COL J. E. Hays is Commander and Director of CERL, and Dr. L. R. Shaffer is Technical Director.

A tilted administrative form, possibly a routing slip or checklist, is located in the lower right quadrant of the page. It contains several fields and checkboxes. A large checkmark is drawn in the top right corner. At the bottom, there is a large handwritten signature or initials. The text on the form is partially legible and includes:

- TO: \_\_\_\_\_
- FROM: \_\_\_\_\_
- DATE: \_\_\_\_\_
- BY: \_\_\_\_\_
- REASON/AVAILABILITY: \_\_\_\_\_
- DATE: \_\_\_\_\_
- TIME: \_\_\_\_\_
- STATUS: \_\_\_\_\_



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**A SYSTEMS APPROACH  
TO CONSTRUCTION  
OF RECREATIONAL  
AREA FACILITIES  
VOLUME II**

**1 STEP-ONE DOCUMENTATION**

This section provides (1) Request for Technical Proposal Step-One Documentation, which provides performance specifications for sanitary facilities (pp 6-38), and (2) evaluation documentation used by the Evaluation Board to evaluate submitted proposals (pp 39-66).



REQUEST FOR TECHNICAL PROPOSAL

(CONSTRUCTION CONTRACT)

TWO-STEP FORMAL ADVERTISING

Reference  
Serial No.

DACW27-75-B-0089

Date: 75 MAY 12

Name of Item

Industrialized Buildings, Sanitary Facilities

To be constructed/erected at various locations  
in the Ohio River Division area.

Department or Agency

Corps of Engineers  
U. S. Army

By (Issuing Office)

DEPARTMENT OF THE ARMY  
LOUISVILLE DISTRICT, CORPS OF ENGINEERS  
600 Federal Place  
Louisville, Kentucky 40202

PURSUANT TO AUTHORITY CONTAINED IN PART 5, "TWO-STEP FORMAL ADVERTISING," OF SECTION II OF THE ARMED SERVICES PROCUREMENT REGULATION, TECHNICAL PROPOSALS, WILL BE RECEIVED FOR THE ABOVE PROJECT UNTIL 4:30 P.M., LOCAL TIME 75 JUN 26 AT THE ABOVE ISSUING OFFICE. HAND CARRIED PROPOSALS WILL BE DELIVERED TO ROOM 821. SUCH PROPOSALS SHALL BE SUBJECT TO ALL APPLICABLE PROVISIONS OF LAW, REGULATIONS, AND THIS REQUEST FOR TECHNICAL PROPOSALS.

1. It is the intent of the Government acting by and through the cognizant Contracting Officer of the U.S. Army Engineer District, Louisville to procure 78 Comfort Stations, 28 of which will have shower facilities, by two-step formal advertising as authorized in Part 5, Section II, of Armed Services Procurement Regulation. A comfort Station which has shower facilities will be identified as a wash house. The procedure to accomplish such procurement under the said Regulation is as follows:

a. STEP ONE

(1) This Request for Technical Proposals is being distributed to qualified sources for the above design and construction services, as necessary to assure full and free competition consistent with the Government's requirements and to conform to the contract requirements and criteria.

(2) In Step I, offerors shall submit a technical proposal based on a design of the offeror's choosing. Such proposals must conform to the criteria prescribed herein. These proposals shall include descriptive specifications, concept drawings, catalog cuts, illustrations, and other data as necessary to enable the Contracting Officer to determine conformance with these criteria.

(3) Proposals will be received and evaluated solely on the basis of the criteria contained in the Request for Technical Proposals, without any consideration of price or pricing information. The Contracting Officer may arrange for discussion with offerors who have submitted technical proposals for the purpose of obtaining additional information or clarifications, prior to evaluation.

(4) Proposals which, after discussion and submission of additional information and clarification required by the Contracting Officer, are determined by him to meet the criteria of the Request for Technical Proposals will be classified as "Acceptable." Proposals which, in the judgment of the Contracting Officer, are not reasonably susceptible to being made acceptable will be classified as "Unacceptable" and the offeror submitting the proposal will be so notified and the reasons given. If an adequate number of proposals is received initially which require no clarification or adjustments, there will be no further discussion of those requiring clarification. They will be deemed unacceptable.

(5) a. In the first step of this two-step procurement, offerors are authorized and encouraged to submit multiple Technical Proposals presenting different basic approaches. Each Technical Proposal submitted will be separately evaluated in accordance with Paragraph (7), Evaluation Criteria.

b. The right is reserved, as the interest of the Government may require, to revise or amend this Request for Technical Proposals or any part thereof, at any time. Such revisions or amendments as may be issued, will be furnished to all prospective offerors. Offerors are required to acknowledge receipt of all amendments to this Request for Technical Proposals. Oral explanations or instructions will not be binding.

(6) Step I Technical Proposals Shall Not Include Prices or Pricing Information.

(7) Evaluation of Proposals

In order for the proposals in the Step I phase to be considered acceptable, the offeror must clearly show that his proposal meets the design and technical criteria contained in this RFTP. Each offeror shall submit two copies of his proposal for evaluation, and include a reproducible copy of each drawing.

Each proposal will be reviewed and evaluated on its own merits.

The aesthetics of the proposal will be evaluated by a team of architects.

(8) LATE TECHNICAL PROPOSALS, MODIFICATIONS OF TECHNICAL PROPOSALS AND WITHDRAWALS OF TECHNICAL PROPOSALS (1973 SEP)

(The term 'postmark' means a printed, stamped, or otherwise placed impression that is readily identifiable without further action as having been supplied and affixed on the date of mailing by employees of the U. S. Postal Service.)

(a) Any proposal received at the office designated in the solicitation after the exact time specified for receipt will not be considered unless it is received before the invitation for bids in Step Two is issued, and

(i) it was sent by registered or certified mail not later than the fifth calendar day prior to the date specified for receipt of offers (e.g., an offer submitted in response to a solicitation requiring receipt of offers by the 20th of the month must have been mailed by the 15th or earlier);

(ii) it was sent by mail (or telegram if authorized) and it is determined by the Government that the late receipt was due solely to mishandling by the Government, after receipt at the Government installation; or

(iii) it is the only proposal received.

(b) Any modification of a proposal is subject to the same conditions as in (a) and (ii) above.

(c) The only acceptable evidence to establish:

(i) the date of mailing of a late proposal or modification sent either by registered or certified mail is the U. S. Postal Service postmark on the wrapper or on the original receipt from the U. S. Postal Service. If neither postmark shows a legible date, the proposal or modification of proposal shall be deemed to have been mailed late.

(ii) the time of receipt at the Government installation is the time/date stamp of such installation on the proposal wrapper or other documentary evidence of receipt maintained by the installation.

(d) Proposals may be withdrawn by written or telegraphic notice received at any time prior to award. Proposals may be withdrawn in person by an offeror or his authorized representative, provided his identity is made known and he signs a receipt for the proposal prior to award.

b. STEP TWO.

(1) Upon completion of the procedures outlined under "Step One" above, a formal Invitation for Bids will be issued for procurement of the services required. Invitation will be to those sources whose technical proposals have been categorized as "Acceptable" under Step One. Bids from other sources will not be considered for award. The Invitation for Bids requires each bidder to submit his price for the services described in the "Acceptable" technical proposal, including any modifications or clarifications which may have been added during the evaluation thereof, submitted by him under Step One.

(2) Bids received in response to the Invitation for Bids will be evaluated competitively in accordance with the Act of 10 August 1956, 10 U.S.C. 2304 (a) and the Armed Services Procurement Regulation. The contract,

if any, resulting from such Invitation will be awarded to the lowest responsive bidder who qualified as a "responsible prospective contractor" as set forth in Part 9, Section I, ASPR. The bids will be evaluated on the basis of the total cost.

2. Reasonable precautions will be exercised for the protection of any proprietary data included in the proposal. If an offeror wishes to restrict his proposal, he shall mark the title page with the following legend:

This data, furnished in connection with Request for Proposals No. \_\_\_\_\_, shall not be disclosed outside the Government and shall not be duplicated, used, or disclosed in whole or in part for any purpose other than to evaluate the proposal; provided, that if a contract is awarded to this offeror as a result of or in connection with the submission of this data, the Government shall have the right to duplicate, use, or disclose the data to the extent provided in the contract. This restriction does not limit the Government's right to use information contained in the data if it is obtained from another source without restriction. The data subject to this restriction is contained in Sheets \_\_\_\_\_ (Dec. 1966).

The offeror shall mark each sheet of data which he wishes to restrict with the following legend:

Use or disclosure of proposal data is subject to the restriction on the Title page of this Proposal. (Dec. 1966)

3. The right is reserved to discontinue the two-step advertising method of procurement at any time if such discontinuance is determined to be in the best interest of the Government.

4. COMMENCEMENT, PROSECUTION, AND COMPLETION OF WORK. The Contractor will be required to commence work under this contract within 10 calendar days after the date of receipt by him of notice to proceed (NTP), to prosecute the work diligently and to complete the work ready for use not later than the dates set forth in the delivery schedule. The detailed delivery schedule will be published at a later date.

5. Technical Performance Specifications for Sanitary Facilities attached as Inclosure 1, will be used by the Government in determining acceptability of the Sanitary Facilities proposed by bidders, from a design, maintenance, operational and functional standpoint. Also, these documents contain the minimum criteria and requirements for the Sanitary Facilities.

6. The successful bidder only will be required to submit for approval complete final design documents, and specifications, 30 days after award of contract.

7. CONTRACTOR QUALITY CONTROL. The Contractor shall provide and maintain an effective quality control program that complies with General Provisions of the contract entitled, "Contractor Inspection System." The Government inspection will be determined on a case-by-case basis.

(a) The Contractor shall establish a quality control system to perform sufficient inspection and tests of all items of work, including that of



his subcontractors, to ensure conformance to applicable specifications and drawings with respect to the materials, workmanship, construction, finish, functional performance, and identification. The controls shall be adequate to cover all production operations and should be keyed to the proposed production sequence.

b. The Contractor's job supervisory staff may be used for quality control, supplemented as necessary by additional personnel for surveillance, special technicians, or testing facilities to provide capability for the controls required by the technical provisions of the specifications.

c. The Contractor shall furnish to the Government within 5 days after receipt of the notice to proceed a quality control plan which shall include the procedures, instructions, personnel laboratories, and reports to be used.

d. After the contract is awarded and before production operations are started, the Contractor shall meet with the Contracting Officer, or his representative, and discuss quality control requirements. The meeting shall develop mutual understanding relative to details of the system, including the forms to be used for recording the quality control operations, inspections, administration of the system, and the inter-relationship of the Contractor and Government inspection.

e. Unless specifically authorized by the Contracting Officer, no production will be started until the Contractor's quality control plan is approved.

f. All compliance inspections will be recorded on an approved form, including but not limited to the specific items required in the technical criteria and the specifications. This form, to include records of corrective action taken, will be furnished to the Government as required by the Contracting Officer.

g. If recurring deficiencies in an item or items indicate that the quality control system is not adequate, such corrective actions will be taken as directed by the Contracting Officer.

#### 8. BID BONDS, PERFORMANCE, AND PAVEMENT BONDS.

a. Those firms submitting acceptable technical proposals and who bid on this project will be required to furnish a bid bond under Step II. Bid bonds will be valid for a period of 90 days. Each bidder shall submit with his bid a Bid Bond or other security which will be explained in the Invitation for Bids under Step II, in the form of twenty percent (20%) of the bid price, or \$3,000,000, whichever is less. The bid bond penalty may be expressed in terms of a percentage of the bid price or expressed in dollars and cents.

b. The successful bidder under Step II will be required to furnish performance and payment bonds, and to enter into a formal contract with the Government, including minimum wage determinations (which will be furnished to bidders of Step II) and all applicable clauses set forth in Section VII, Part 6 of the Armed Services Procurement Regulation and Labor Standards Provisions (Standard Form 19A). Within 5 days after the prescribed forms are presented to the bidder to whom award is made for signature, a written contract on the form which will be prescribed under Step II shall be executed and two bonds, each with good and sufficient surety or sureties acceptable to the Government, furnished; namely, a performance bond (Standard Form 25 or 27) and a payment bond (Standard Form 25A or 27A). Any bonds furnished will be furnished by the Contractor to the Government prior to commencement of the contract performance. The penal sums of such bonds will be as follows:

c. Performance Bond. The penal sum of the performance bond shall equal one hundred percent (100%) of the contract price.

d/ Payment Bond. When the contract price is \$1,000,000 or less, the penal sum will be fifty percent (50%) of the contract price.

When the contract price is in excess of \$1,000,000 but not more than \$5,000,000, the penal sum shall be forty percent (40%) of the contract price.

When the contract price is more than \$5,000,000, the penal sum shall be \$2,500,000.

9. Insurance Required. The Contractor will be required to procure and maintain during the entire period of his performance under this contract the following minimum insurance. Further details will be included in Step II.

| <u>TYPE</u>  | <u>AMOUNT</u>                                     |
|--|---|
| Workmen's Compensation and<br>Employer's Liability Insurance | \$100,000   |
| General Liability Insurance                                  | \$50,000 per person and<br>\$100,000 per accident |
| Automotive Liability Insurance<br>Bodily Injury              | \$50,000 per person and<br>\$100,000 per accident |
| Property Damage  | \$5,000 per accident                              |



10. The acronym "RFTP" as used throughout this solicitation means "Request for Technical Proposal".

11. For additional information concerning the technical aspect of Step One, contact Mr. Bill Showers, 502-582-5784.

For additional information concerning the contract, contact Mr. Joseph Theobald, 502-582-5598.

12. Inclosures

1. Technical Performance Specifications

2. Guide Drawings

Description

|       |                                     |
|-------|-------------------------------------|
| No. 1 | Regular Toilet Stall                |
| No. 2 | Handicap Toilet Stall               |
| No. 3 | Regular Urinal Stall                |
| No. 4 | Regular Shower and Dressing Alcove  |
| No. 5 | Handicap Shower and Dressing Alcove |
| No. 6 | Lavatory                            |

3. Special Drawings

Description

|                      |       |  |
|----------------------|-------|--|
| EXCLUDED FROM REPORT | No. 1 | Ohio River Plan of Development           |
|                      | No. 2 | Brookville Lake Bonwell Hill             |
|                      | No. 3 | Brookville Lake Reservoir Area Map       |
|                      | No. 4 | East Fork Lake Jurisdiction Map          |
|                      | No. 5 | Caesar Creek Lake Area Map               |
|                      | No. 6 | Patoka Lake Area Map                     |
|                      | No. 7 | East Lynn Lake Plan of Development       |
|                      | No. 8 | Plum Creek Lake Plan of Development      |
|                      | No. 9 | Youghiogheny Recreation Area Master Plan |

**PERFORMANCE SPECIFICATIONS**

**Inclosure 1**

**Performance Specification  
for Sanitary Facilities**

**U.S. Army Corps of Engineers**

**May 1975**

## TECHNICAL SPECIFICATIONS

### PERFORMANCE TYPE

| SECTION | TITLE                           |
|---------|---------------------------------|
| 1       | DESIGN GOALS                    |
| 2       | STRUCTURE                       |
| 3       | FACILITY ENVELOPE               |
| 4       | INTERIOR SPACE AND PLANNING     |
| 5       | DOOR FRAMES, DOORS AND HARDWARE |
| 6       | CAULKING AND SEALING            |
| 7       | SPECIALTIES                     |
| 8       | HEATING                         |
| 9       | PLUMBING                        |
| 10      | ELECTRICAL                      |

### INCLOSURE 2—SUGGESTED GUIDE DRAWINGS

|   |                                 |
|---|---------------------------------|
| 1 | REGULAR TOILET STALL            |
| 2 | HANDICAP TOILET STALL           |
| 3 | REGULAR URINAL STALL            |
| 4 | REGULAR SHOWER-DRESSING ALCOVE  |
| 5 | HANDICAP SHOWER-DRESSING ALCOVE |
| 6 | LAVATORY                        |

## 1. DESIGN GOALS

### 1.1. GENERAL

- 1.1.1 This project will provide sanitary facilities for recreational areas. The buildings shall be constructed to meet the physical and performance requirements shown in these technical specifications. These specifications do not preclude the use of materials, designs and processes not specifically set forth herein. Other finishes and methods may be proposed for approval. The reviewing committee's decision will be final in all cases.
- 1.1.2 It shall be the responsibility of the proposer to bring any ambiguous passages, errors, inconsistencies, or omissions in these specifications to the attention of the review committee for interpretation, clarification and/or correction by no later than 9 June 1975.
- 1.1.3 Foundation and site work to the five foot line, *including floor system* will be done by the proposer. This does not include the sidewalks, which will be installed by the Government.
- 1.1.4 Design of these facilities shall be aesthetically pleasing. Compatibility with the natural environment is required. Facilities should present a harmonious appearance which blends with the park scenery. Submittals will be evaluated by a board to be designated by the U.S. Army Engineer District, Louisville. Where the Corps of Engineers reviewers determine that a proposed building is unattractive, even though meeting all the standards below, it will be judged non-responsive.
- 1.1.5 Variety in design image, materials and colors are to be provided for the exterior permitting several standard exterior material selections by using agency. A minimum of three exterior treatments and one interior treatment are to be submitted in the step one proposal for evaluation. Variety of exterior building material treatments may be reflected in several different prices at step two phase of contract.
- 1.1.6 Building units may be so designed that showers may be combined with toilet units in one building.
- 1.1.7 Building units may be pre-assembled complete, or component-assembled at the job site.
- 1.1.8 Facilities should provide for low maintenance.
- 1.1.9 The interior designs may be similar in appearance, colors, and finish materials. All surfaces, interior and exterior, shall be resistant to dirt and should permit easy cleaning.
- 1.1.10 Surfaces shall be moisture resistant in public areas.
- 1.1.11 Designs should provide for ease and interchangeability of replacement parts. Supplier shall use parts and components standard in the industry to the extent of adequate availability from other manufacturers.
- 1.1.12 Proposer shall provide a complete facility parts list including manufacturer source, part number, size, etc. Parts list will be requested from the successful step two bidder.
- 1.1.13 Facilities shall be constructed and equipped so as to withstand malicious abuse. All connections and fastenings must be concealed. Where this is not possible, *tamper-proof hardware* must be used.
- 1.1.14 Facilities are to be designed for 24-hour per day operation, but capable of lock-up shutdown on a seasonal basis.
- 1.1.15 Any plan and building form shape that meets the space and aesthetic requirements may be proposed.
- 1.1.16 Piping shall not be accessible to the public; utility controls shall not be accessi-

ble to the public. Heating and ventilating equipment shall not be accessible to the public.

- 1.1.17 Facilities are to be accessible to and usable by the physically handicapped. The requirements of ANSI #A117.1 shall be met.
- 1.1.18 Submit a color rendering(s) which would best portray the proposed design solution in a number and size needed to portray the project. As a minimum, in addition to floor plans and elevations, the proposer shall also submit reproducible drawings of typical wall sections, sections of joints between walls, ceilings and floors, sections of head jambs and sills, drawing size approximately 36 in. x 24 in. Provide specifications for materials and facility components. Drawing size shall be as close to 36 in. x 24 in. as possible to expedite Government reproduction of drawings.
- 1.1.19 In the event an infrequently used product or material with little or no substantiating data is proposed for use, test data may be requested from the proposer, to insure these items as specified meet the requirements of these specifications.
- 1.1.20 All facilities shall be insulated to meet the stated U-factor throughout these specifications. The identification of the number and listing per project site for facilities requiring heaters is contained within this RFTP.
- 1.1.21 The facility floor to ceiling height shall not be less than 8 ft.
- 1.1.22 A full scale working test on each facility, with all plumbing, electrical, mechanical, equipment and appliances in operation shall be made on all equipment and as specified herein. All systems shall be proven satisfactory for operation and free from defects at time of test. Test shall be conducted within 30 days of construction/erection of facility at each reservoir site. If required, electrical gen-

erators will be supplied by the contractor.

## 1.2 OBJECTIVE:

- 1.2.1 The objective of this solicitation is to allow prospective proposers wide latitude in design, materials and construction for this project. Any study drawings accompanying or added later as a supplement to this RFTP are to be considered as guidance only, not as final plan arrangement.
- 1.2.2 Facilities shall be designed for a life expectancy of 25 years.
  - 1.2.2.1 All materials and workmanship must meet this criteria.
  - 1.2.2.2 The performance requirements of these specifications as outlined hereinafter are intended to meet this criteria.
  - 1.2.2.3 These specifications are not intended to exclude materials and workmanship not described hereinafter. If materials and methods other than those specified are proposed for use, they must meet the appropriate standards.
  - 1.2.2.4 Among the durability characteristics to be considered are:
    - 1.2.3.4.1 Weathering
    - 1.2.3.4.2 Adhesion of Finishes
    - 1.2.3.4.3 Abrasion Resistance
    - 1.2.3.4.4 Impact Resistance
    - 1.2.3.4.5 Spalling Resistance
    - 1.2.3.4.6 Puncture Resistance
    - 1.2.3.4.7 Corrosion Resistance
    - 1.2.3.4.8 Discoloration
    - 1.2.3.4.9 Vermin Resistance
  - 1.2.3.5 Durability characteristics shall meet the test methods and criteria of the latest ASTM specifications and Federal Standards.
- 1.2.4 There are 78 Comfort stations, 28 of which shall have shower facilities included. Wash house is the term used for these 28 facilities where indicated on Special Drawings 1 thru 9.



## 2. STRUCTURE

2.1 **WORK DESCRIPTION:** This section describes requirements pertaining to the design, fabrication, transporting, and erection of all members, components, assemblies, and foundation(s) of the building(s) to assure structural integrity of the final product to support all dead and applied design loads. Also requirements pertaining to coordination for building foundation are specified.

### 2.2 REFERENCED PUBLICATIONS:

- 2.2.1 The Aluminum Association
- 2.2.2 The American Concrete Institute
- 2.2.3 The American Institute of Steel Construction
- 2.2.4 The American Iron and Steel Institute
- 2.2.5 American National Standards Institute
- 2.2.6 The American Society for Testing Materials
- 2.2.7 The American Welding Society
- 2.2.8 The Concrete Reinforcing Steel Institute
- 2.2.9 National Concrete Masonry Association
- 2.2.10 OSHA
- 2.2.11 National Lumber Manufacturers Association
- 2.2.12 The Prestressed Concrete Institute
- 2.2.13 Structural Clay Products Institute
- 2.2.14 The Steel Joist Institute
- 2.2.15 National Building Code
- 2.2.16 Uniform Building Code, International Conference of Building Officials
- 2.2.17 The Basic Building Code, Building Officials and Code Administrators International, Inc.
- 2.2.18 Metal Building Manufacturers Association

2.3 **MATERIALS:** All material and workmanship shall meet specified requirements of the applicable *REFERENCED PUBLICATIONS* and such other specifications referred to hereafter or shall be proven by certified test by a reputable laboratory to support safely all loads to which the material will be subjected. Where specifications are quoted, reference should be made to the most recent publication.

### 2.4 DESIGN

- 2.4.1 **General:** The structures shall be designed and constructed to resist or sup-

port all dead loads and design loads and transportation forces specified as follows: Except for the amended loads listed below, the superstructure shall be designed for the most stringent requirements of local, state and/or applicable standard national building codes.

|         |        |
|---------|--------|
| Wind    | 30 psf |
| Snow    | 30 psf |
| Seismic | None   |

- 2.4.2 The overall minimum strength of interior walls or partitions shall be sufficient to support a load of 10 psf applied horizontally over the entire vertical surface of one side of the wall with no perceptible permanent residual deflection, damage to surfaces, finishes, supports, or subassemblies.

[Building of a structural type not having identifiable walls, roofs, etc. (e.g., domes, etc.) shall interpret the term "wall" to mean vertical or near vertical (up to 20° from vertical surfaces and "roofs" to mean horizontal or near horizontal surfaces (greater than 20° from vertical).]

- 2.4.3 Walls shall sustain an impact energy of 60 ft-lbs, with an average maximum deflection not exceeding 0.125 inches, applied horizontally at any location five consecutive times without perceptible permanent residual deflection, damage to surfaces, finishes, supports, or subassemblies.
- 2.4.4 Where applicable, walls or partitions shall be designed to support the attached plumbing fixtures and bars for the handicapped. The basis for this design shall be the support of a 300 lb concentrated load, with no impact factor, positioned so as to produce maximum shear or bending moment in the supporting member.
- 2.4.5 Separately installed toilet or shower compartment walls shall also be capable of resisting the aforementioned wall loads with adequate structural connections to building walls.



- 2.4.6 Provide visual screens at each entrance door. Interior or exterior type permitted.

2.5 **FABRICATION:** Where a previously established effective quality control program is maintained by the manufacturer and the welding is performed in the factory by production line welders, certification of welders will not be required. All other welding shall conform to the American Welding Society requirements.

2.6 **FOUNDATION:** The proposer shall design and construct the foundation(s) required for his superstructure. Building sites specified in this contract document are available for inspection by the proposer. Foundation materials and construction must be able to support the superimposed dead and live loads. In the event that concrete is used, the compressive strength must be not less than 2500 psi. Foundations must not be less than 3 ft 0 in. below finished grade, or lower if required by local frost conditions. In the event masonry block is used, block must be solid conforming to ASTM C-145, Type U, latest edition.

### 3. **FACILITY ENVELOPE**

#### 3.1 **OBJECTIVE:**

- 3.1.1 This section will provide the performance criteria for design of the walls, roof and floor elements which comprise the facility envelope.
- 3.1.2 The envelope shall resist any excessive ingress and effects of wind, moisture, heat, cold, light, noise, particulates, odors, insects, birds, and animals from the outside. At the same time, it must contain and help retain the desired interior environment. This facility will be considered a miscellaneous structure as defined in NFPA #101. All components shall provide adequate resistance to fire. Continuous paths in walls, floors, and ceilings should be avoided to impede possible spread of fire.
- 3.1.3 Entrances to the facility shall be screened from view.

#### 3.2 **EXTERIOR WALLS:**

##### 3.2.1 Exterior walls shall:

- 3.2.1.1 Be adequate structurally. Must be able to support its own superimposed dead load. If prefabricated units are provided, they must be constructed so as to adequately resist all stresses due to transportation, handling and erection.
- 3.2.1.2 Meet 0.20 "U" factor for winter conditions.
- 3.2.1.3 Provide protection from corrosion and decay of building components. This shall be achieved by one of the following methods.
- 3.2.1.3.1 Use materials which are not affected by elements causing corrosion and decay.
- 3.2.1.3.2 Treat materials so as to make them resistant to elements causing corrosion and decay. Wood shall be preservative treated by pressure methods in accordance with AWPB (American Wood Preservers Bureau) standards.
- 3.2.1.4 Meet quality standards for material and workmanship required by these Technical Performance Specifications.
- 3.2.1.5 Provide for natural light and ventilation as follows:
- 3.2.1.5.1.1 Provide natural light in the aggregate amount of not less than 10% of the total floor area of each public space.
- 3.2.1.5.1.2 Lowest level of light source must be not less than 6 ft 0 in. above finished floor.
- 3.2.1.5.1.3 Natural light must consist of a corrosion resistant frame and a non-breakable light transmitting obscure material.
- 3.2.1.5.1.4 Aluminum windows must conform to AAMA requirements.
- 3.2.1.5.1.5 Steel windows must conform to Steel Window Mfg. Assoc. requirements.

3.2.1.5.1.6 Wood windows must conform to National Woodwork Mfg. Assoc.

3.2.1.5.1.7 Window glazing for light must be polycarbonate or acrylic.

3.2.1.5.1.8 Air infiltration: Not to exceed .5 cfm per foot of sash at a static air pressure of 25 mph.

#### 3.2.1.5.2 Natural Ventilation

3.2.1.5.2.1 Provide natural ventilation in the aggregate amount of 5% of the total floor area of each space. Natural ventilation may be achieved by use of ventilating type windows.

3.2.1.5.2.2 If louvers are used, they must be fixed, stormproof type of non-corrosive material, complete with bird screen and demountable insulated cover to be used on interior during winter months.

3.2.2 Exterior materials of brick, stone and wood are to be used in their natural state. Finish wood shall be stained or painted in accordance with 3.6.1.

3.2.3 Any wall indentations shall be designed to discourage the nesting of birds and insects.

3.2.5 Walls shall provide for the minimization and positive drainage of condensation within the walls.

### 3.3 FLOOR SYSTEM:

3.3.1 Junction of all floors and walls shall be covered and absolutely water-tight.

3.3.2 Modules if used may have an integral floor to facilitate installation.

3.3.3 Floor must be constructed to support a 60 lb live load plus its dead load.

3.3.4 Floor system shall provide a "U" factor of .34 for winter conditions.

3.3.5 Floor systems may be of wood, steel,

concrete, or other suitable materials. Floor should provide adequate resistance against any "bouncing" effect while floor is being walked upon.

3.3.5.1 Floor construction must receive continuous hosing down. Proposers must substantiate resistance to treatment of this kind. In addition, precautions must be taken to:

3.3.5.1.1 Protect against moisture, termites, and other insects, rot, bacteria, etc.

3.3.5.1.2 Use wood material with maximum 19% moisture content at site.

3.3.5.1.2 Avoid warpage and sagging. Provide adequate resistance against any "bouncing" effect while floor is being walked upon.

#### 3.3.5.2 Steel Floor System:

3.3.5.2.1 Must be protected against corrosion.

#### 3.3.5.3 Concrete Floor:

3.3.5.3.1 If concrete floor is used, it may be an integral part of the structure or it can be a separate slab, to which the shell could be bolted at the site. The option of using a site-poured slab can also be proposed.

3.3.5.4 Other Floor Systems: Other floor systems that meet the structural and other requirements set forth in these specifications may also be used.

3.3.5.4.1 Systems proposed in this category shall cite all background data needed for evaluation, including deflection, reaction to temperature changes, previous performance record, etc.

3.3.5.4.2 Finish Floor Elevation—Finish floor shall be at least 6 in. above finish grade.

### 3.4 ROOFS

3.4.1 Roof shall meet the design "U" factor of .20.

3.4.2 Reference Structure Section for load requirements.

3.4.3 Roofs shall be rigidly connected to the walls, to act integrally in the shell structure against imposed loads.

3.4.3.1 Roof shall provide at least  $\frac{1}{4}$  in. per lineal foot slope.

3.4.4 Roof shall provide:

3.4.4.1 Drainage—Positive drainage is required. Roof drainage may be accomplished in any fashion which prohibits water from running down the side walls of the building and which protects the entrance.

3.4.4.2 Provide roof with a design life expectancy of a minimum of 25 years duration.

3.4.4.3 Flashing shall be provided as required and installed to prevent leaks.

3.4.4.4 If there is space between the roof and the ceiling surface, the proposer shall design for required ventilation and/or vapor barrier.

3.4.5 Roof structure materials may be concrete, metal, or wood; however, other suitable materials may be submitted for approval. Roof materials should be durable and resistant to water and weather penetration. Proposer shall provide details regarding intended method of application.

### 3.5 MISCELLANEOUS EXTERIOR METALS:

3.5.1 Accessories (screws, louvers, vents, etc.) needed for job completeness shall be detailed to avoid electrolysis. The finish color of all accessories shall match the adjacent background color and be unobtrusive in the design.

### 3.6 EXTERIOR PAINTING:

3.6.1 To conform to the low maintenance goal, it is desirable to minimize required painting. When paint is required pro-

poser shall indicate type of paints to be used and number of coats. Paint materials and number of coats must be such that repainting will not be required more often than every 5 years.

3.6.2 Paint color schedules shall be included in the Step One submittal for evaluation.

## 4. INTERIOR SPACES AND FINISHES

4.1 DESCRIPTION: This section includes performance specifications for all interior floor covering, partitions, ceilings, and the inside surface of the exterior walls of the building. Interior space planning will also be covered. See section 7 for mirrors, stalls, accessories, etc.

4.2 FIRE RATINGS: Interior finishes shall meet or exceed Class A per Life Safety Code #101, 1973. Flame spread not to exceed 25.

### 4.3 INSIDE SURFACE OF EXTERIOR WALLS AND INTERIOR PARTITION MATERIALS

4.3.1 Acoustics—Special acoustic treatment is not required except as follows: To insure sound reduction between mens and womens toilet/showers, provide Sound Transmission Class (STC) rating of 50 in separating walls to roof deck. If suspended ceiling is used (STC) rating may be provided above ceiling.

4.3.2 Materials and Workmanship: Walls must be protective to hose-down cleaning, on lower portion of the wall of approximately four (4) feet. The following are some of the materials which may be considered for use as wall finish:

#### 4.3.2.1 Concrete

4.3.2.1.1 Surface finish shall be smooth enough to prevent injury from abrasion upon contact.

#### 4.3.2.2 Plywood Panel

4.3.2.2.1 All plywood shall meet Type I requirements for Product Standard PS 51-71.

4.3.2.2.2 Finish must be protective against hose-down cleaning requirements.

4.3.2.3 Masonry (Brick, Stone, Block, etc.)

4.3.2.3.1 Mortar joints shall be tooled to be pre-finished or finished in field to meet requirements of 4.3.2.

4.3.2.3.2 Finish surface shall be smooth enough to prevent abrasive type injury upon contact.

4.3.2.3.3 Masonry must have protective finish or be adequately non-absorbent against hose-down cleaning.

4.3.2.4 Interior Painting

4.3.2.4.1 Minimum painting is desirable for low maintenance.

4.3.2.4.2 Painting materials—Use only materials and finishes able to withstand hose-down cleaning. This also applies to natural finish.

4.3.2.5 Protective Wall Coatings

4.3.2.5.1 Following are two coating systems which may be used. Other systems may be used upon approval. Do not mix systems.

4.3.2.5.2 Polyester wall coating. Minimum thickness 12 mils on smooth surfaces. Use with block filler when base material is masonry block.

4.3.2.5.2 Epoxy wall coating. Note: For performance requirements see Appendix 1.

4.3.2.6 Structural Glazed Tile

#### 4.4 FINISH FLOORING AND BASE

4.4.1 Floor construction will receive daily hosing down. Proposers must substantiate resistance to treatment of this particular kind.

4.4.1.1 Concrete

4.4.1.1.1 Finish shall be non-slip surface.

4.4.1.1.2 Slope floors to drains.

4.4.1.2 Other Floor Materials

4.4.1.2.1 Other suitable floor materials may be proposed.

4.4.1.3 Protective Floor Coatings

4.4.1.3.1 Protective Floor Coatings, if utilized, shall be applied at temperatures above 40° F.

4.4.1.3.2 Protective floor and base coating shall be a 2-component epoxy formulation and shall meet requirements of the military specification MIL-P-24441 or Federal Specification TT-C-535.

#### 4.5 CEILINGS

4.5.1 All ceilings exposed to public shall be finished. Ceilings shall provide for low maintenance and washable cleaning.

4.5.2 Proposer must show how sound control will be provided between mens and womens toilets.

#### 4.6 INTERIOR SPACE REQUIREMENTS

4.6.1 Minimum aisle space needs are established by meeting the requirements of the physically handicapped, per ANSI A117.1.

4.6.1.1 Exterior doors shall swing out.

4.6.2 Showers will have provisions for curtains. (Reference 7.2.3.2.4) Provide dressing alcove with bench and door for each shower. See sketches for suggested benches in handicapped shower.

4.6.2.1 For the handicap shower, the dressing alcove must allow straight-in access. If a 90° turn is necessary there must be sufficient area for this turn. For guidance purposes refer to sketches indicating minimum dimensional requirements.



- 4.6.2.2 Floor drains shall be provided so that drainage from the shower area does not drain into other areas.
- 4.6.3 Basic plan can be any shape that meets the design goals and space requirements set forth in these specifications.
- 4.6.4 Following is the list of vandal-resistant plumbing fixtures required: (See Section 9, Plumbing for fixture detail requirements.)
  - 4.6.4.1 One drinking fountain mounted on the outside face of an exterior wall. Provide a side fountain approximately 30 in. above grade or otherwise provide for the handicapped per ANSI A117.1. Provide one drinking fountain per building.
  - 4.6.4.2 Provide three (3) shower units—one of which is for the handicapped—for each of the men's and women's shower facilities. (Showers may be located in a separate building or in the same building as the toilets.) (See Section 7 for shower enclosure materials.)
  - 4.6.4.3 In each men's toilet room provide:
    - 4.6.4.3.1 Two (2) water closets, one of which is for the physically handicapped (top of seat approximately 1 ft 8 in. above floor. Proposer has the option of using a high seat in conjunction with specified water closet as opposed to raising the fixture level.
    - 4.6.4.3.2 One (1) urinal mounted with rim approximately 1 ft 7 in. above floor, to accommodate both handicapped and non-handicapped males.
    - 4.6.4.3.3 Three (3) lavatories, mounted with bottom of rim approximately 2 ft 6 in. above floor for the physically handicapped.
    - 4.6.4.3.4 Provide one (1) lawn faucet operated by detachable key, in the area beneath the lavatory. (See Section 9, Plumbing.)
    - 4.6.4.3.5 Provide a shelf in the area between the lavatory and toilet mirror, not less than 6 inches in width, extending the length of the lavatory and attached in a vandal resistant manner.
  - 4.6.4.4 In each women's toilet room provide:
    - 4.6.4.4.1 Three (3) water closets, one (1) of which is for the physically handicapped (top of seat 1 ft 8 in. above floor). Proposer has the option of using a high seat in conjunction with specified water closet as opposed to raising the fixture level.
    - 4.6.4.4.2 Three (3) lavatories, mounted with bottom of rim approximately 2 ft 6 in. above floor, for the physically handicapped.
    - 4.6.4.4.3 Provide one (1) lawn faucet. (Reference 4.6.4.3.4)
    - 4.6.4.4.4 Provide a shelf in the area between the lavatory and toilet mirror, not less than 6 inches in width, extending the length of the lavatory and attached in a vandal resistant manner.
- 4.6.5 Toilet stalls shall be a minimum of 4 ft 9 in. long x 2 ft 8 in. wide, except stall for the physically handicapped which shall be at least 4 ft 9 in. long and 3 ft 2 in. wide (see Section 5 for doors, and Section 7 for enclosure materials).
- 4.6.6 All showers shall be at least 3 ft 0 in. x 3 ft 0 in., although showers for the physically handicapped shall be equipped differently. The latter will include a folding bench and specific accessories (see Section 7, Specialties).
- 4.6.7 There is to be no provision for facility-furnished soap. Soap holders are to be provided in the showers (see Section 7, Specialties).
- 4.6.8 Toilet stall partitions shall be mounted to withstand lateral and vertical point loads of at least 150 pounds. Floor supports, if provided, will have non-corrosive finishes.

4.6.9 Shower dressing alcoves shall be mounted in accordance to guidance in 7.2.4 including Dwg 4 and Dwg 5.

4.6.10 General planning layout should provide for the minimum travel distance for the maximum number of users.

4.6.10.1 Locate the electric hand dryer nearer to the facility entry than the lavatories. Mount so that bottom of unit box casing is approximately 3 ft 4 in. to 3 ft 8 in. above floor.

## 5. DOOR FRAMES, DOORS AND HARDWARE

5.1 DESCRIPTION: This section covers performance requirements for all doors, frames and hardware.

### 5.2 DOOR FRAMES

5.2.1 Materials and construction shall be strong enough to resist anticipated high abuse and impact loading at these facilities. Reference "2.4 Design" for specific requirements.

5.2.1.1 Materials may be steel, wood, aluminum or other materials able to resist abuse and must conform to published standards.

5.2.1.1.1 Steel frames shall conform to the recommended specifications for standard steel doors and frames (S.D.I. 100), published by the Steel Door Institute.

5.2.1.1.2 Aluminum frames shall meet the requirements of the Architectural Aluminum Manufacturers Association (AAMA).

5.2.1.2 Frames shall be installed plumb and square, and securely anchored. Reference 5.2.1.1.

### 5.3 DOORS

5.3.1 Doors shall meet the same requirements as stated for door frames.

5.3.2 Metal doors (steel or aluminum) shall have top and bottom edges closed flush and sealed against water penetration. Doors are to be minimum of 1 3/4 in. thick.

5.3.3 Doors are to be a minimum 1 3/4 in. thick, and shall not be hollow core and shall be surfaced with metal.

#### 5.3.4 Door Sizes:

5.3.4.1 Facility public entry doors shall be at least 3 ft 0 in. wide by 6 ft 8 in. high.

5.3.4.2 Utility access entry door is to be sized to permit removal of heater and water heater equipment.

### 5.4 HARDWARE AND SPECIALTIES

5.4.1 Due to the vandalism and facility abuse expected, all hardware shall be of the most sturdy quality, type and construction available and installed to insure connection is vandal resistant.

5.4.2 Provide key-alike system for all exterior doors of all facilities for a particular project.

5.4.2.1 Locksets shall conform to Federal Specification FF-H-106A. Permanent cores for cylinders will be furnished by the Department of Natural Resources, State of Indiana for buildings located in Indiana.

#### 5.4.3 Facility Public Entry Doors:

5.4.3.1 Provide heavy duty cylinder locks.

5.4.3.1.1 Provide a 1 in. throwbolt to operate only with the key lock.

5.4.3.2 Provide heavy duty closer concealed in the door head.

5.4.3.3 Provide 1 1/2 pair heavy duty hinges with tamper proof hinge pins.

5.4.3.4 Install extruded interlock aluminum threshold with maximum 1/2 in. height.



Zero Weatherstripping Co. #74, Argil J. May Mfg. #68-A or A. Nitt & Son Mfg. #1500.

5.4.3.5 Provide interlocking sill weatherstrip, and jamb-up or equivalent type of weatherstripping on top and jambs of doors.

5.4.3.6 Install stainless steel kickplates the width of door and a minimum of 16 in. high on exterior surface of entry doors to public spaces. Plates are to be attached using a vandal-resistant method.

5.4.3.7 Provide push and pull devices on all exterior doors except utility access door.

5.4.4 Separate entry door to utility spaces:

5.4.4.1 Same requirements as listed for facility public entry doors except delete closer and kickplate (include threshold, weatherstripping, and hardware that enables maintenance personnel to close and lock access to these spaces).

5.4.4.2 Provide doorstop limiting open position to prevent damage.

## 6. CAULKING AND SEALING

### 6.1 GENERAL

6.1.1 Execute all work in conformance with manufacturer's recommendations, insuring the facility will withstand penetration by the weather.

6.1.3 Use standard sealant colors to closely match adjacent materials.

### 6.2 MATERIALS

6.2.1 All sealants and backup material shall conform to American National Standards Institute (ANSI) A116.1. Material must be fully compatible.

6.2.2 Primer: Use a type recommended by manufacturer of caulking compounds. Material must be fully compatible.

6.2.3 Type A Sealing Compound: Shall conform to Federal Specifications TT-S-227B, Type II, one or two component.

6.2.4 Type B Sealing Compound: Shall conform to Federal Specifications TT-S-227B, Type I, one or two component.

6.2.5 Type C Sealing Compound: Shall conform to Federal Specification TT-S-230a.

6.2.6 Type D Caulking Compound: Shall conform to Federal Specifications TT-S-227a or TT-S-227b.

## 7. SPECIALTIES

7.1 DESCRIPTION: This section describes specialty items required to be furnished and installed by the Facility Contractor. These items will include toilet stall partitions, urinal screens, showers, toilets, shower dressing alcoves, folding seat for handicap shower, benches for shower dressing alcoves (except at handicap dressing alcove), toilet and shower accessories, mirrors, utility storage shelving, hand dryers.

### 7.2 ITEMS

#### 7.2.1 Toilet Stall Partitions

7.2.1.1 Doors and panels shall be minimum of 1 in. thick, using two facing sheets of minimum of 20 ga. galvanized, bonderized, stretcher-leveled steel. Laminated plastic fiberglass products may be used as a substitute, provided it produces the same performance. Product shall meet the requirements of 4.2 Fire Ratings.

7.2.1.2 Provide at least three wall and pilaster panel brackets. Provide additional attachments as required.

7.2.1.3 All corners shall be mitered, welded, and ground smooth.

7.2.1.4 Painted surfaces shall receive a minimum of 2 coats of premium quality synthetic baking enamel, applied as recommended by manufacturer.

- 7.2.1.5 Door and panel sheets, etc., may be 302 stainless steel in lieu of above material and finish.
- 7.2.1.6 If floor-mounted enclosures are used follow guidance in 4.6.8.
- 7.2.1.7 Enclosures of other materials meeting the design goals may be proposed for approval.
- 7.2.2 Urinal Screens:
  - 7.2.2.1 Proposer shall provide a urinal screen if proposed design has a lavatory and urinal fixture side-by-side.
  - 7.2.2.2 Panel is to be a minimum of 2 ft 0 in. depth x minimum of 4 ft 10 in. high x minimum of 1 1/4 in. thick. Panel is set approximately 1 ft 0 in. above floor.
    - 7.2.2.2.1 Urinal screen shall be securely anchored to resist vandal abuse.
    - 7.2.2.2.2 Materials, finish and color shall match the toilet stalls.
- 7.2.3 Showers:
  - 7.2.3.1 Shower stalls may be preformed single piece units. Shower units of premolded one-piece construction which meet the design goals of this RFTP may be submitted for approval. Materials, gauges, and configuration will be assessed against the stated goals.
  - 7.2.3.2 Shower stalls may be panel-assembled construction.
    - 7.2.3.2.1 Panels shall be at least 1 in. thick, with minimum of 20 ga. steel, or equal. Panels shall be smooth and interlock into leak-proof recesses (without use of screws). Construction of shower should be such to insure sound-deadening effect.
    - 7.2.3.2.2 If steel is utilized in panels, it shall be bonderized, galvanized, primed and painted as recommended by manufacturer of product.
  - 7.2.3.2.3 Stainless steel may also be used for panels.
  - 7.2.3.2.4 Showers shall have provisions for curtains to separate the shower area and the shower dressing alcove. Design of curtain rod shall be to support a 300 lb concentrated load at mid-span, with no impact factor.
- 7.2.4 Shower Dressing Alcoves:
  - 7.2.4.1 Doors, panels, pilasters, construction, materials, and attachments for shower dressing alcoves shall be similar to the toilet stall general specifications.
  - 7.2.4.2 Floor supports for the shower partition, if used, shall be noncorrosive, permit drainage and resist minimum 60 ft-lb impact load.
- 7.2.5 Folding Seat in Handicap Shower:
  - 7.2.5.1 Provide a folding seat which meets the standards as specified by ANSI. Provisions should be made to insure seat is secured out of the way for use by non-handicapped persons.
  - 7.2.5.2 Seat must be waterproof and corrosion resistant.
  - 7.2.5.3 Seat must be of rugged construction—including wall attachments—to resist vandalism.
  - 7.2.5.4 Locate seat where shower head spray can easily cover a person using it.
- 7.2.6 Benches for Shower Dressing Alcoves (except at handicap dressing alcoves).
  - 7.2.6.1 Benches shall be dimensioned for the accomplishment of the seating of an individual and placement of personal articles.
  - 7.2.6.2 Height shall be approximately 1 ft 6 in.
  - 7.2.6.3 Locate bench on one side of the alcove.
  - 7.2.6.4 Benches shall be waterproof and corrosion resistant.

7.2.6.5 Bench must be of rugged construction—including floor or wall attachment to resist vandalism.

7.2.6.6 Bench finish must meet the facility design life and the vandalism-resistance requirement.

7.2.6.7 Any materials meeting the RFTP design goals may be proposed.

#### 7.2.7 Toilet and Shower Accessories:

##### 7.2.7.1 Clothes Hooks:

7.2.7.1.1 Provide one coat hook in each toilet stall and shower dressing alcove.

7.2.7.1.2 Mount coat hooks approximately 5 ft 4 in. above the floor.

7.2.7.1.3 Coat hooks shall be corrosion resistant.

7.2.7.1.4 Coat hooks and mounting shall be especially vandal resistant.

7.2.7.1.5 Locate coat hooks at a safe area of the wall to prevent inadvertent impact.

##### 7.2.7.2 Toilet Paper Holders:

7.2.7.2.1 Provide toilet paper holders of the restrictive dispensing type for two rolls of paper at each toilet stall.

7.2.7.2.2 Locate holders for maximum user convenience.

7.2.7.2.3 Holders are to be corrosion resistant and shall be of a design to protect the paper from getting wet in the hose down cleaning operation.

7.2.7.2.4 Holders may be two single roll units in each stall, or one combined two-roll unit in each stall.

7.2.7.2.5 Paper holders must be highly vandal resistant.

7.2.7.2.6 Holders are to accommodate paper rolls, not the flat sheet type paper.

##### 7.2.7.3 Soap Dishes:

7.2.7.3.1 Provide one soap dish in each shower.

7.2.7.3.2 Mount soap dishes for maximum user convenience.

7.2.7.3.2.1 Locate the soap dish to protect it from direct water spray.

7.2.7.3.3 For handicap shower, mount soap dish for maximum user convenience from bench position.

7.2.7.3.4 Soap dishes shall be corrosion resistant.

7.2.7.3.5 Either recessed or projected type units may be used.

7.2.7.3.6 Soap dishes and mounting must be highly vandal resistant.

##### 7.2.7.4 Grab Bars for the physically handicapped:

7.2.7.4.1 Provide grab bars in shower stall on the two sides away from the folding seat at approximately 3 ft 0 in. above floor as per ANSI standards.

7.2.7.4.2 The grab bar opposite the seat is to be approximately 2 ft 6 in. long, and the grab bar on the side of the shower is to be approximately 1 ft 6 in. long.

7.2.7.4.3 The folding seat shall clear the grab bar on the side of the shower in the act of folding.

7.2.7.4.4 Provide grab bars on both sides of the toilet stalls for maximum user convenience, and as per ANSI standards.

7.2.7.4.5 Provide one grab bar on inside face of toilet stall door at a height for maximum user convenience.

7.2.7.4.6 All grab bars are to be approximately 1½ in. outside diameter stainless steel with peened finish. Provide approximately 1½ in. clear between grab bar and wall. Grab bar should

have a slip resistant finish as per ANSI standards.

7.2.7.4.7 All grab bars and their connections shall be vandal resistant.

7.2.7.4.8 Grab bars connections shall also be corrosion resistant.

7.2.8 Toilet Mirrors:

7.2.8.1 Provide minimum of 24 in. wide x 36 in. high polished stainless steel mirrors above each lavatory.

7.2.8.2 Mount mirror approximately 3 ft 6 in. above floor at handicap lavatories.

7.2.8.3 Mirrors are to be installed with vandal resistant attachments.

7.2.9 Storage Shelving Inaccessible to Public:

7.2.9.1 Provide storage shelves as follows:

7.2.9.1.1 At least 30 square feet of shelf area total, with top shelf at maximum height of 6 ft 0 in.

7.2.9.1.2 Minimum shelf depth shall be 1 ft 0 in. and maximum depth to be 1 ft 6 in.

7.2.9.1.3 Any materials meeting the design goals of the RFTP may be proposed.

7.2.9.2 Finish of shelving shall permit easy cleaning.

7.2.9.3 Shelving and its supports shall be strong enough to hold the weight of normal supplies, weighing not more than 30 pounds.

7.2.10 Hand Dryers:

7.2.10.1 Mount units at a maximum convenient height of all users including the handicapped.

7.2.10.2 Exposed material and mounting shall withstand the hose-down cleaning requirement.

7.2.10.3 Unit shall be vandal resistant.

7.2.10.4 Unit shall have no nozzle. Hand dryer nozzle if provided shall be fixed in a down position to prevent damage by hosing down operation and vandal abuse.

7.2.11 Toilet Stall and Shower Enclosure Door Hardware:

7.2.11.1 Doors are to have a latch to insure privacy.

7.2.11.1.1 Provide bumper stop for door in closed position.

7.2.11.2 Provide gravity hinge concealed within the door. Set gravity hinge to provide positive closure.

## 8. HEATING

8.1 WORK DESCRIPTION: This section covers the heating and ventilating systems for the building. Included is supply of all components and equipment, installation, supervision, testing in-place, and adjustments.

### 8.2 THE WORK INCLUDES:

8.2.1 Complete heating systems consisting of means of overcoming heat losses in the space to regulate temperature. Heating energy shall be supplied by electricity.

8.2.2 All thermal insulation and covering required for the elements of the heating systems.

8.2.3 Equipment bases and vibration-isolation equipment.

8.2.4 Sleeves, hangers, wall and roof openings, roof curbs, flashing and weather-proofing.

8.2.5 Required safety devices and antivandalism measures.

8.3 CODES AND STANDARDS: All work shall be performed in full accordance and conformity with current requirements of the following unless



more stringent requirements are otherwise specified.

- 8.3.1 ASHRAE Guide
- 8.3.2 Factory Insurance Association
- 8.3.3 Underwriters' Laboratories
- 8.3.4 Uniform Building Code
- 8.3.5 NFPA Pamphlets: 70 National Electrical Code; 90A
- 8.3.6 SMACMA
- 8.3.7 Uniform Mechanical Code.

#### 8.4 DESIGN CRITERIA:

- 8.4.1 Heating—inside conditions:
  - 8.4.1.1 The toilet rooms and shower rooms shall be heated to 50° F.
  - 8.4.1.2 The space(s) for access to the piping shall be heated to 35° F and where there is piping and equipment subject to freezing.
- 8.4.2 Heating—outside conditions: The heating system shall maintain the required temperature at an outside design temperature of -15° F. This will include air infiltration.
- 8.4.3 General: The heating system shall be designed to furnish hot air to the building units. Where heating of the building units is not required, spare electric capacity shall be provided in the panel-board to permit heating unit at a later date.
- 8.4.4 Safety and vandalism: The design shall be in accordance with safety codes governing the type of equipment installed. Heating equipment shall be located so it will be accessible only to maintenance personnel. Thermostats shall not be accessible to public. Grills shall withstand an impact energy of 60 ft-lbs and shall be secured with tamper proof screws or through bolts.

## 9. PLUMBING

9.1 WORK DESCRIPTION: This section covers the plumbing system including hot and cold water piping, plumbing fixtures, water heating equipment, and sanitary drainage system for the modules. Provisions for wash down of the building units with drainage thru floor drains into the sanitary drainage system shall be made. A floor drain shall be installed in the space containing the piping connections. Sanitizing of water lines shall not be required under this contract.

9.2 CODES AND STANDARDS: All work shall be performed in full accordance and conformity with current requirements with the following codes and standards unless otherwise specified.

- 9.2.1 State Plumbing Codes: The plumbing system shall be designed and installed so as to conform to the plumbing codes for any of the states in which they are to be installed. Where the codes differ the more stringent code shall be used.
- 9.2.2 National Plumbing Code ANSI A40-8.
- 9.2.3 Federal Specification WW-P-541 D1 and applicable detailed specifications.
- 9.2.4 Uniform Plumbing Codes

#### 9.3 PIPING

- 9.3.1 Water Piping and Fittings
  - 9.3.1.1 Cold water and hot water piping 2 in. and smaller, ASTM B-88-62 copper tubing with B-16.22-1951 wrought copper fittings; type K tubing where buried and type L above grade.
  - 9.3.1.2 Cold water piping 2½ in. and larger above grade shall be Schedule 40 galvanized steel pipe with screwed galvanized malleable iron, 150 lb ASTM A197, ANSI B16.3 fittings. Copper piping may be used instead of galvanized steel at contractor's option.
  - 9.3.1.3 Cold water piping above grade may be plastic pipe instead of copper. Plastic cold water piping shall be PVC, not lighter than Schedule 40, ANSI B72,

2-1967, NSF 14, with PVC solvent weld fittings; all threaded PVC pipe used for connections to threaded equipment shall be not lighter than Schedule 80.

9.3.1.4 Design of Water Piping: The hot and cold water piping system shall be designed for a minimum pressure of 100 psi. Shock arrestors shall be installed where required to prevent hydraulic shock. The piping shall be designed for a maximum velocity of 10 feet per second or a maximum drop of 10 psi in the system, whichever governs. A gate valve and drain on the service line shall be installed inside the heated utility space as near the floor as possible. A hose bibb shall be installed just above the valve for system drainage. All piping shall be installed in a manner that provides for drainage. Each fixture shall have water cut off valves so as to be inaccessible to public. A pressure reducing valve should be installed with downstream pressure set for 20-30 psi.

9.3.1.5 Valves: Plumbing valves shall be gate valves. Gate valves 2 in. and smaller shall be 125 pound bronze body, rising stem, union bonnet, solid wedge for screwed and valves or for solder joint end valves. Gate valves 2½ in. and larger shall be 125 lb cast iron body, solid wedge, rising stem, OS&Y, screwed with adapters for copper piping, or flanged. Alternatives to this type of valve may be submitted for approval.

9.3.1.6 Insulation: All hot water piping shall be insulated with a minimum ½ in. thick fiberglass with cloth covering or equal. Armaflex is not acceptable.

9.3.2 Sanitary Piping: May be no-hub cast iron soil pipe and fittings, or DWV copper tubing with solder type drainage fittings, or ABS plastic drainage pipe and fittings, Schedule 40 ASTM D2661-68.

9.3.3 Pipe Installation: Piping shall be installed in straight parallel lines without sags or pockets. Piping shall be ade-

quately supported to prevent movement. Piping shall have provisions for drainage. A hose bibb shall be provided in the cold water in a location available to maintenance personnel only to be used for wash down. Piping shall not be exposed in public use areas.

9.3.4 Water Heaters: A water heater (or heaters) shall be installed to supply each building unit with hot water.

9.3.4.1 Water heaters shall be UL approved electric automatic storage type.

9.3.4.2 Heaters shall have a minimum 3-year manufacturer's warranty and each heater shall have an ASME pressure and temperature relief valve piped to an approved discharge point. The relief valve shall have a BTU rating in excess of the heating capacity.

9.3.4.3 Each heater shall be supplied with cut-off valve on hot and cold water connection and drain and unions at heater connection. Provide a vacuum relief valve installed on the cold water supply line to the heater just above the top of the tank. The electrical characteristics are covered under Section 10.

9.3.4.4 The heaters shall be installed in a space inaccessible to the public. The water temperature supplied to the fixtures shall be automatically controlled to not exceed 120° F.

9.3.4.5 The capacity of the heater shall be based on the following requirements and be glass lined:

Lavatory—10 gallon/hr each

Showers—100 gallon/hr each

Base heat recovery on factory of .15  
(based on 40° to 140° rise)

Base storage capacity of factor of .2

9.3.5 Plumbing fixtures shall be in accordance with WW-P-541D.

9.3.5.1 Water closet, WW-P-541/1A—elongated bowl with flush valve, wall-mounted with concealed push button, open front seat without cover.

Part A Type II Style D Class 9  
Part C Type IV Class 3  
Part D Type I Style F8  
Part E Type I or II Style 2 Model D

9.3.5.2 Urinal - WW-P-541/2A - wall-hung, siphon jet, integral trap, extended shields, concealed push button.

Part A Type I Style A Class 3  
Part B Type I or II Style B Class 4

9.3.5.3 Lavatory WW-P-541/1A Shelf back

Part A Type II with self closing metered push button hot and cold water, concealed trap  
Part C Type IV concealed push button, metered flow  
Part D - Stopper - popup type in wash building only  
Part F Type I - Class 1 or 2

9.3.5.4 Shower fittings WW-P-541/7B vandal proof head, single control mixing valve, metered push button in mixed water line. Locate shower head in compartment so that spray will not be directed toward the shower entrance, and dressing area.

Part C Shower Head - Type III Special institutional type vandal proof concealed  $\frac{1}{2}$  in. ip inlet,  $15^{\circ}$  -  $30^{\circ}$  spray adjustment  
Automatic flow regulation  
Part E valves type P pressure balancing single lever control valve with concealed metered push button located in mixed water line to shower head. Provide flow regulator in mixed line to regulate flow to a maximum of 3 gpm.

9.3.5.5 Lawn Faucet WW-P-541/8A

Type VIII lawn faucet, angle body  $\frac{1}{2}$  in. ips, detachable key, chrome plated.

9.3.5.6 Drinking Fountain WW-P-541/6A (freeze proof type)

Type I Class A wall mounted. Con-

cealed self-closing push button water supply with control valve located in utility space. The waste trap shall be located in the utility space.

## 10. ELECTRICAL

10.1 WORK DESCRIPTION: The Contractor shall design and provide a complete electrical system for each unit. The system shall include all electrical service equipment and complete interconnection between the service equipment and the user facilities. The system shall also include the items and function specified herein.

### 10.2 POWER DISTRIBUTION:

10.2.1 Service to the building shall terminate at a main breaker in a 120/240 volt, single (1) phase, three (3) wire panelboard. The panelboard shall be rated 240 volts minimum, and have a continuous current rating sized in accordance with the estimated load.

Option (when applicable): Service to —

10.2.2 All breakers shall be rated to withstand available short circuit at the breaker (short circuit is based on estimated one hundred (100) foot underground feeder length, percent impedance of transformer and infinite bus at the primary of the transformer) or be protected by a current limiting device on the line side of the breaker.

10.2.3 Ground fault protection shall be provided on all circuits that feed devices that are accessible to the public, including hand dryers and duplex receptacles. Duplex receptacles shall be either the GFI type or be installed on separate circuits, each operated by GFI type circuit breaker. Ground fault protection shall satisfy the requirements of the 1975 National Electric Code.

### 10.3 LIGHTING

10.3.1 Footcandle levels shall be "maintained" levels (including maintenance factor to

compensate for lamp depreciation and dirt accumulation) at the normal work plane. The footcandle level shall be 30 foot candles over lavatories and 10-20 elsewhere. Fixtures shall be vandal proof in public areas. Fixtures in public areas shall be controlled by a photo cell (located outside). Photoelectric cell circuit should have capability of being manually overridden whether on or off. Controls shall not be accessible to the public.

- 10.3.2 Exterior lights shall be located at all exterior entrances to the facility. The footcandle level shall be minimum of 5 footcandles at ground level, five feet from entrances. . . . Fixtures shall be vandal-proof and controlled by a photocell. The photoelectric device shall have the capability of being manually overridden whether on or off. Controls shall not be accessible to the public.

#### 10.4 RECEPTACLES:

- 10.4.1 At least two 110 volts, single phase, twenty (20) amperes duplex receptacles shall be provided, each of which shall be located convenient to mirrors.

#### 10.5 EQUIPMENT POWER:

- 10.5.1 Electric power and locally mounted disconnect means shall be provided for each heater, water heater or other unit of equipment required for operation of this facility.

#### 10.6 SHOP DRAWINGS:

- 10.6.1 Shop drawings shall be provided for panel boards; illustrative material for lighting fixtures.

#### 10.7 STANDARDS FOR MATERIAL AND WORKMANSHIP:

- 10.7.1 All materials and equipment shall be new and shall conform with the standard of Underwriters' Laboratories, Inc. (U.L.) in each case where referenced

herein and where such a standard has been established for the particular type of material or equipment required.

- 10.7.2 The specifications and standards of the following organizations are by reference made a part of these Specifications and all electrical work, unless otherwise indicated, shall comply with their requirements and recommendations wherever applicable.

- 10.7.2.1 American National Standard Institute (ANSI)
- 10.7.2.2 American Society for Testing Materials (ASTM)
- 10.7.2.3 Certified Ballast Manufacturers Association (CBM)
- 10.7.2.4 Illumination Engineering Society (I.E.S.)
- 10.7.2.5 Institute of Electrical and Electronic Engineers (I.E.E.E.)
- 10.7.2.6 National Electrical Manufacturers Association (NEMA)
- 10.7.2.7 American Hot Dip Galvanize Association

#### 10.8 CODES, PERMITS AND INSPECTIONS:

- 10.8.1 The installation shall comply with the following and as specified herein:

- 10.8.1.1 National Fire Protection Association Publication Number 70 (National Electrical Code - 1975).

#### 10.9 COMPLETENESS OF WORK:

- 10.9.1 Provide all boxes, offsets, bends, devices, raceways, raceway supports, fittings, wiring, lighting fixtures, panelboards, etc., as required for the complete installation.

#### 10.10 ELECTRICAL SERVICE:

- 10.10.1 A service entrance conduit sized to accommodate the service entrance conductors shall be extended from the panelboard to a point 5 feet outside of the building and 1 ft 6 in. below grade. Conduit shall be capped and marked.



## 10.11 GROUNDING

- 10.11.1 The interior electrical systems shall have (a) an electrical equipment ground and (b) an electrical system ground and each shall be completely and effectively grounded as required by the National Electrical Code and appropriate Federal Specifications.
- 10.11.2 Electrical System Ground: The system ground shall be provided by grounding the neutral of the system. The system ground conductor shall be connected to the equipment ground, but only at the main service panelboard.
- 10.11.3 Grounding conductors within the building shall be insulated.
- 10.11.4 Rigid metal or rigid non-metallic conduit or electrical metallic tubing installed in accordance with Articles 346, 347, and 348 respectively of the National Electrical Code.
- 10.11.5 Electrical metallic tubing may be provided, concealed, for circuits above grade or slab for lighting branch circuits and for power. Rigid conduit and electrical metallic tubing shall have a sheradized or galvanized coating.
- 10.11.6 Conduit shall be sized to enclose power cable required to serve equipment. Minimum conduit size shall be one-half ( $\frac{1}{2}$ ) inch for power and lighting wiring. A nylon cord fish wire shall be installed in all empty conduits. For unheated units, empty conduit shall be provided with end capped adjacent to location of future duct heater.
- 10.11.7 Flexible conduit runs shall be maximum of twenty-four (24) inches in length except if used to make a connection between two (2) modular units or systems components. Flexible metallic conduit shall be galvanized flexible conduit and fittings with insulated throats.
- 10.11.8 If metallic conduit is used bushings one and one-fourth ( $1\frac{1}{4}$ ) inches and larger shall be malleable iron or galvanized steel with insulated throats. If electrical metallic tubing is used for enclosing wire No. 4 AWG and larger connectors shall have insulated throats.
- 10.11.9 Conduit fittings for a metallic conduit system shall be zinc-coated. Conduit fittings for raceways smaller than one and one-half ( $1\frac{1}{2}$ ) inches shall be one size larger than the raceway.
- 10.11.10 Rigid non-metallic conduit shall be polyvinyl chloride with all necessary fittings and accessories. All rigid non-metallic conduit and accessories shall be listed by Underwriters' Laboratories, Inc.
- 10.11.11 Wireway may be used as raceway in location where such an application is practicable. If wireway is used it shall be "lay-in" type with lengths and connectors. Wireway shall be of steel construction with a removable cover for ease of installation and shall have captive screws with which to secure the covers whenever necessary to prevent access by unauthorized personnel. The same type length shall be used throughout the system for maximum future flexibility and reuse. Manufacturers lengths of wireway shall be used wherever possible, but cuts shall be permitted where absolutely necessary. All fittings must be so constructed to continue the "lay-in" feature through the entire installation. All sheet metal parts shall be provided with a rust-inhibiting phosphatizing coating and painted to match the architectural surroundings. Wireway shall be provided with knockouts. All lengths, connectors and fittings shall be Underwriters' Laboratories, Inc., labeled and installed in accordance with the National Electrical Code.

## 10.12 SHEET METAL ENCLOSURES

- 10.12.1 Auxiliary gutters, cabinets and boxes shall be galvanized and shall be supported from building structure or back-up board independent of raceways.

## 10.13 OUTLETS

- 10.13.1 Where more than one device is shown in a location, and potential between conductors within box is less than 300 volts, they shall be gang mounted in a box of appropriate size.
- 10.13.2 Lighting fixture outlets shall be provided with suitable covers to receive fixture to be installed thereon.

## 10.14 CONDUCTORS

- 10.14.1 Conductors shall be copper for sizes # 6 AWG and smaller and copper or aluminum for sizes greater than # 6 AWG. Conductors shall conform to American Society of Testing Materials (ASTM) Specifications as to conductivity and shall be free from kinks and defects when installed.
- 10.14.2 Conductors # 14 AWG through # 10 AWG shall be Type TW or RHW, and larger conductors shall be Type THW, THWN, or RHW. Conductors #8 AWG and larger shall be stranded.
- 10.14.3 Splices and taps in conductor sizes # 14 AWG to # 10 AWG shall be made UL approved.

## 10.15 PANELBOARDS

- 10.15.1 Panelboards shall be of the types indicated herein or approved equals. The sizes shall be determined by the contractor. Doors of panelboards shall have a flush lock and latch with all locks keyed alike for each project site.
- 10.15.2 Typewritten directory cards shall be provided in all panelboards.
- 10.15.3 Panelboards shall be installed to insure proper access by servicing personnel.

- 10.15.4 Integral construction, common trip breakers shall be provided where two (2) and three (3) pole units are scheduled. (Single pole units with handle ties are not considered multi-pole units.)

- 10.15.5 Each panelboard shall contain twenty percent (20%) unused space available.

- 10.15.6 Unheated units shall have spare circuit breaker in panel sized for future heater.

- 10.15.7 Panelboards shall be selected on the basis of required interrupting capacities of the breakers (Reference 10.2.2). If current limiting devices are used they must be selected to coordinate with other current limiting devices to provide a fully rated selective system.

## 10.16 SAFETY SWITCHES AND DISCONNECTING SWITCHES

- 10.16.1 Safety and disconnecting switches, fused or non-fused, shall be heavy duty type UL approved.
- 10.16.2 If contactors are used in conjunction with photoelectric lighting control they shall be electrically operated, mechanically held, in NEMA one (1) enclosure with number of poles and coil voltage as required and UL approved.

## 10.17 WIRING DEVICES

- 10.17.1 All wiring devices shall be listed by Underwriters' Laboratories, Inc. (UL) and conform to the National Electrical Manufacturers Association (NEMA) configurations and applicable Federal Specifications.

## 10.18 COVER PLATES

- 10.18.1 Cover plates for switches and receptacles shall be vandal resistant and corrosion resistant.

## APPENDIX 1

### PERFORMANCE REQUIREMENTS FOR POLYESTER AND EPOXY WALL COATINGS

- a. The finish must be water repellent and resistant to abrasion, stain, contamination and crazing, and must meet the following performance requirements based on the specified tests:
- (1) Adhesion:
    - A. The adhesion tests must consist of three (3) test panels. Test panels must be scored across the width of the panel through the wall surfacing. A strip of adhesive tape 6 in. wide must be pressed down on the score line for approximately 1 in., allowing 2 in. to 3 in. for free end. The tape must be peeled in a rapid motion, bending it back 180° on itself.
    - B. Test must show no lifting or removal of surfacing beyond  $\frac{1}{16}$  in. on each side of the score line.
  - (2) Abrasion:
    - A. Test panels must be 4 in. x 4 in. in size.
    - B. The test panels must be exposed to a falling sand test and the loss determined by using increments of 2000 ml. of Ottawa Sand. Specimens must show no appreciable abrasion after 6000 ml.
  - (3) Hardness:
    - A. The coating must have a minimum hardness of between 3H and 4H when tested by pencil hardness test.
    - B. A series of pencils of hardness between F and 5H must be sharpened, then sanded to produce a flat wedge. Hardness of film must be tested by pushing wedge forward into surface and determined which pencil first penetrates into coating.
  - (4) Scratch resistance:
    - A. A load of 2150 gm must be placed on a tungsten carbide needle, the point consisting of a hemisphere 1 ml in diameter, and drawn across the surface at a rate of 2 in. per second.
    - B. No apparent scratching or scoring must occur.
  - (5) Color and glaze retention:
    - A. Test must consist of three (3) test panels. Each panel must be in three (3) different colors: blue, yellow and red.
    - B. Panels must be half covered with black tape. The panels must then be exposed to a Fadeometer for 100 standard fading hours and examined every 20 hours.
    - C. No noticeable change in color shade or glaze must occur during this period. No defects such as crazing or cracking must occur, and no whitening must appear which cannot be wiped off with a soft cloth.
  - (6) Flame spread, fuel contribution and smoke ratings:
    - A. All proposed wall surfacing must meet the following Performance Specifications:
      - I. Flame Spread Rating 0-25; Fuel Contribution 0-5; Smoke Development 0-10 when treated in accordance with ASTM E-84, latest edition, National Fire Prevention Association and must conform to Class "A" requirements of Part 11.
    - b. Test panels must be same material as proposed for use in the building to which the finish is applied. The panels must be coated with finish in accordance with the procedures used on an actual job site. Panels must be 8 in. x 16 in., except where other sizes are specifically called for.
    - c. Submit affidavits from testing lab, indicating compliance with these performance requirements.

Inclosure 2

Guide Drawings



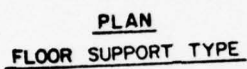
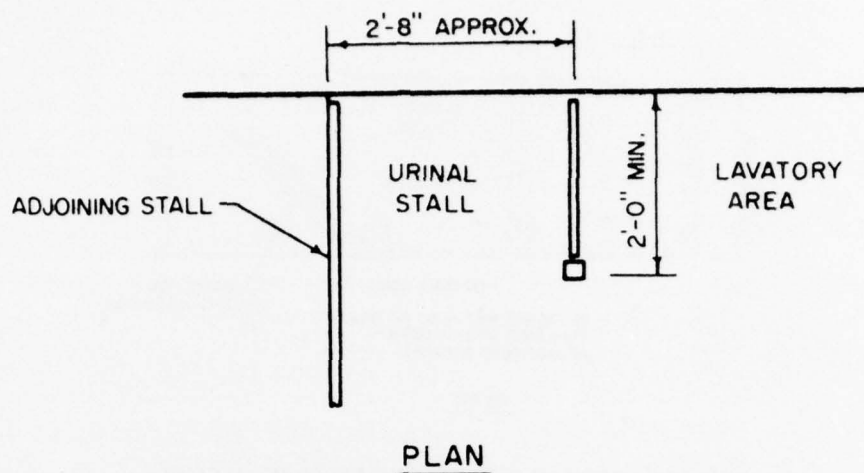


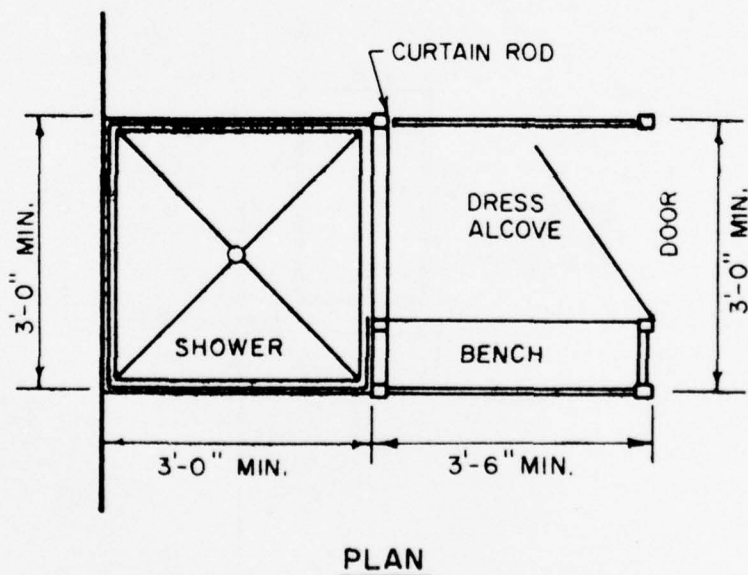
Diagram illustrating the dimensions and components of a stall and grab bar assembly:

- Overall width: 3'-2" MIN.
- Stall width: 4'-9" MIN.
- Grab bar width: 4'-4" MIN.
- Grab bar diameter: 1-1/2" DIA.
- Clearance from wall: 1-1/2" CLEAR.
- Components: STALL, HANDRAIL, DOOR AND 2'-0" GRAB BAR.

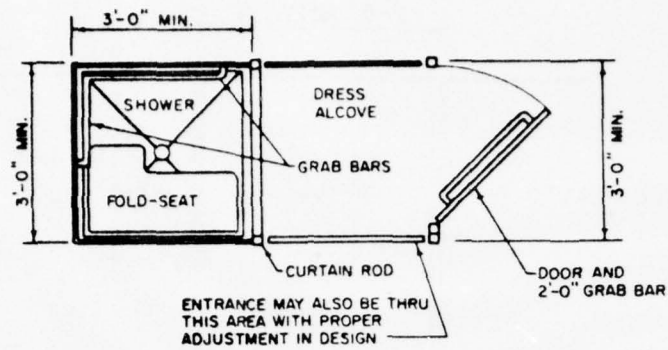
36



DWG.-3 REGULAR URINAL STALL

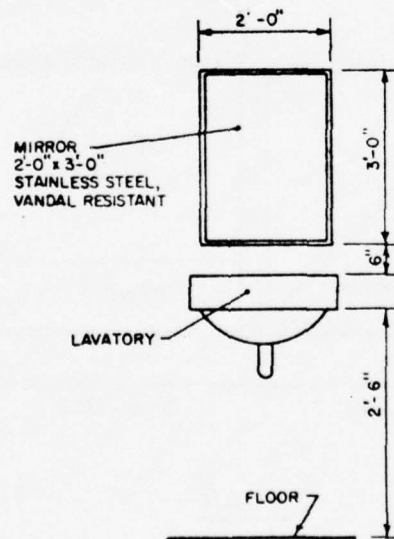


DWG.-4 REGULAR SHOWER AND DRESSING  
ALCOVE



PLAN

DWG.-5 HANDICAP SHOWER AND DRESSING ALCOVE



ELEVATION

DWG.-6 LAVATORY

STEP 1 EVALUATION DOCUMENTS FOR INDUSTRIALIZED BUILDINGS,  
SANITARY FACILITIES

July 1975

Department of the Army



Evaluation Document 1

Name of Bidder: \_\_\_\_\_

Address: \_\_\_\_\_

Evaluation Areas:  
(To be signed and dated upon completion of evaluation area)

*Aesthetic/Design* \_\_\_\_\_

*Electrical Features* \_\_\_\_\_

*Structural Integrity* \_\_\_\_\_

*Mechanical and Plumbing* \_\_\_\_\_

*Functional Space Utilization* \_\_\_\_\_

*Security and Vandal Resistant* \_\_\_\_\_

*Materials* \_\_\_\_\_

Evaluation Assessment Factors at Nonacceptable Level  
(Please check if appropriate and indicate applicable attribute(s).)

*Aesthetic/Design* [ ] \_\_\_\_\_

*Electrical Features* [ ] \_\_\_\_\_

*Structural Integrity* [ ] \_\_\_\_\_

*Mechanical and Plumbing* [ ] \_\_\_\_\_

*Functional Space Utilization* [ ] \_\_\_\_\_

*Security and Vandal Resistant* [ ] \_\_\_\_\_

*Materials* [ ] \_\_\_\_\_

Proposal Response (check one):

Acceptable with no modification \_\_\_\_\_

Nonacceptable as identified above \_\_\_\_\_

Contracting Officer  
U.S. Army Engineer District,  
Louisville

## Evaluation Document II

### Instructions

Board members should complete the aesthetic/design areas of analysis, which follows in order to assist in the determination of the responsiveness of the design. Each member should assess independently the design, aesthetics, and appearance of the proposed facility in accordance with the identified areas and criteria. Judgments should be based on proposals being responsive or nonresponsive to the performance specifications. If a proposal area is identified as nonresponsive, board members should briefly identify the reason immediately below the aesthetic/design area in order to enable the contracting officer to discuss appropriate modifications with the proposer.

### *Aesthetic/Design*

#### A. General Aesthetics

1. Attribute: Aesthetically pleasing.

Criteria: The proposed facility should convey a pleasant visual expression which could be attractive and would satisfactorily create a sense of public pride.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

2. Attribute: Facility design form.

Criteria: The proposed form and general design should permit easy identification of the facility without intruding upon its surroundings.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

3. Attribute: Blend harmoniously.

Criteria: The proposed facility should blend harmoniously with the natural park environment.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

4. Attribute: Colors, textures, and materials of exposed surfaces.

Criteria: A minimum of three exterior treatments and one interior treatment are to be submitted.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_  
Reason \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

5. Attribute: Texture of facility surface.

Criteria: Texture of material should exhibit some form of complexity and diversity to reflect the characteristics of intended site surroundings.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_  
Reason \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

6. Attribute: Portion and distribution of the building masses.

Criteria: The distribution of the building mass with regard to size (e.g., length, width, and height) should be in a pleasing proportion.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_  
Reason \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

7. Attribute: Satisfactory blending of windows, doors, louvers, and other openings in exterior and interior design.

Criteria: The location of the building elements, such as windows, ventilation fixtures, and entrances should blend satisfactorily with the exterior and interior design.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_  
Reason \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

8. Attribute: Color renderings and floor plans, etc., required to portray design solution.

Criteria: Proposer shall have submitted floor plans, elevations, typical wall sections, sections of joints between walls, ceilings, and floors, sections of head jambs and sills.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

**B. General Design**

1. Attribute: General layout interior design.

Criteria: General planning layout should provide for the minimum travel distance for the maximum number of users.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

2. Attribute: Fire ratings.

Criteria: Interior finishes shall meet or exceed Class A per Life Safety Code #101, 1973. Flame spread not to exceed 25.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

3. Attribute: Minimum requirement for natural light and ventilation.

Criteria: The distribution of the building elements must be of a proportion as specified in the performance specification:

(a) Natural lighting—aggregate amount of not less than 10 percent of the total floor area

(b) Natural ventilation—aggregate amount of 5 percent of the total floor area. If louvers are used, they must be fixed, storm proof type, complete with bird screen and demountable insulated cover.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_



4. Attribute: Visual screen at public entrances.

Criteria: Designs must provide a method of visually screening inside facility activities from outside view.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

5. Attribute: Dressing alcove access.

Criteria: The dressing alcove must allow straight-in access. If a 90 degree turn is necessary for a wheelchair, there must be sufficient area for this turn.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

6. Attribute: Level of light source.

Criteria: Lowest level of light source must be not less than 6 ft 0 in. above finish floor.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

### C. Design Elements

1. Attribute: Exterior drainage.

Criteria: Positive drainage is required; may be accomplished in any fashion which diverts water from running down the side walls of facility and protects entrance.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

2. Attribute: Interior drainage.

Criteria: Floor drains shall be provided throughout facility. Shower drains shall insure shower area does not drain into other areas.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

3. Attribute: Floor drains.

Criteria: Floor drains shall be installed throughout the facility (including space containing the piping connection) to insure proper drainage.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

4. Attribute: Space between roof and ceiling.

Criteria: If there is space between the roof and ceiling surface, the proposer shall design for required ventilation and vapor barrier.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

5. Attribute: Exterior doors, general.

Criteria: Exterior door shall swing out.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

6. Attribute: Public entry door.

Criteria: Reference specifications 5.4.3 for list of requirements.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

7. Attribute: Utility space door.

Criteria: Reference specifications 5.4.3 for list of requirements except delete heavy-duty closer and kick-plate. Doorstop must be provided to limit open position.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_

8. Attribute: Urinal screen.

Criteria: Urinal screen shall be provided if proposed design has a lavatory and urinal fixture side-by-side. Materials, finish, and color shall match the toilet stalls.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_

9. Attribute: Toilet stall and shower enclosure door hardware.

Criteria: Doors are to have a latch to insure privacy, bumper stop for door in closed position, and gravity hinge set to provide positive closure.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_

10. Attribute: Hand dryers.

Criteria: Exposed material and mounting shall withstand the hose-down cleaning requirement. Nozzle, if provided, shall be fixed in down position.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_

11. Attribute: Hand dryers.

Criteria: Mount units at a maximum convenient height of all users including the handicapped. (Reference 4.6.10.1)

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

12. Attribute: Folding seat in handicapped shower.

Criteria: Folding seat must meet the standards as specified by ANSI. Locate seat where shower head spray can easily cover a person using it.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

13. Attribute: Bench for shower dressing alcove.

Criteria: Locate bench on one side of the alcove.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

14. Attribute: Toilet paper holder.

Criteria: Provide toilet paper holders of the restrictive dispensing type for two rolls of paper at each toilet stall.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

15. Attribute: Shower soap dish.

Criteria: Locate to protect it from direct water spray. Locate for maximum user convenience.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_



16. Attribute: Handicap shower soap dish.

Criteria: Located for maximum user convenience from bench position.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

17. Attribute: Handicap folding seat.

Criteria: The folding seat shall clear the grab bar on the side of the shower in the act of folding.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

18. Attribute: Toilet paper holder.

Criteria: Locate for maximum user convenience.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

19. Attribute: Coat hook.

Criteria: Locate coat hooks at a safe area of the wall to prevent inadvertent impact.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

## Evaluation Document III

### Instructions

Board members should complete the areas of analysis which follow to assist in the determination of the responsiveness of the design. Each member should independently assess their evaluation areas in accordance with the identified areas and criteria. Judgments should be based on proposals being responsive or nonresponsive to the total requirements of the Request for Technical Proposal (RFTP). If a proposal is identified as nonresponsive, board members should briefly identify the reason immediately below the evaluation areas to enable the contracting officer to discuss appropriate modifications with the proposer.

### *Electrical Features*

#### A. General

1. Attribute: Illumination level.

Criteria: The footcandle level shall be 30 footcandles over lavatories and 10 to 20 elsewhere.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

2. Attribute: Illumination location.

Criteria: Lowest level of light source must be not less than 6 ft 0 in. above finished floor.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

3. Attribute: Exterior lights.

Criteria: Exterior lights shall be located at all exterior entrances to the facility with a minimum of 5 footcandles at ground level and 5 ft from the entrance.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

4. Attribute: Receptacles.

Criteria: At least two 110-V, single-phase duplex receptacles shall be provided, each of which shall be located convenient to mirrors.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

5. Attribute: Shop drawings.

Criteria: Drawings shall be provided for panel boards, and illustrative material for lighting fixtures.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

6. Attribute: Other electrical features.

Criteria: Additional items identified in proposals and which correspond to stated electrical requirements should be verified with the written description in specification sections 10.2 through 10.18.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

*Structural Integrity*

**A. General**

1. Attribute: Slope of roof.

Criteria: Design of roof shall provide at least  $\frac{1}{4}$  in. per linear foot slope. (Reference 3.4.3.1)

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

2. Attribute: Roof structure.

Criteria: Proposer shall provide details regarding intended method of application. (Reference 3.4.5)

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

3. Attribute: Resist or support all dead loads and design loads.

Criteria: The superstructure shall be designed for the most stringent requirement of local, state, or national building code and the following: wind—30 psf; snow—30 psf; seismic—none.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

4. Attribute: Overall minimum strength of interior walls or partitions.

Criteria: The material and structural supports shall be sufficient to support a load of 10 psf, applied horizontally. (Reference specifications 2.4.2; an estimate should be based on descriptive information supplied in proposal.)

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

5. Attribute: Wall strength.

Criteria: Walls shall sustain an impact energy of 60 ft-lbs. (Reference specifications 2.4.3; an estimate should be based on descriptive information supplied in proposal.)

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_



6. Attribute: Plumbing fixtures and handicapped bar support.

Criteria: Applicable walls, or partitions shall be designed to support 300 lb concentrated load on plumbing fixtures and handicapped bars. (Reference 2.4.4; an estimate should be based on descriptive information supplied in proposal.)

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

7. Attribute: Toilet or shower compartment walls.

Criteria: Should comply with items a through d as described above.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

8. Attribute: Visual screen.

Criteria: Provide visual screens at each entrance door.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

9. Attribute: Superstructure foundation.

Criteria: Proposer shall design and construct foundation required for his superstructure. Foundation materials and construction must be able to support the superimposed dead and live loads. (Reference specifications 2.6; an estimate should be based on descriptive information supplied in proposal.)

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

10. Attribute: Floor system.

Criteria: Floor must be constructed to support a 60-lb live load plus its dead load.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

11. Attribute: Toilet stall partitions.

Criteria: Stall partitions shall be mounted to withstand lateral and vertical point loads of at least 150 lb.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

12. Attribute: Separately installed toilet or shower compartment walls.

Criteria: Compartment walls shall be capable of resisting the wall loads (reference specification 2.4) with adequate structural connections to building walls.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

13. Attribute: Toilet stall partitions.

Criteria: Doors and panels shall be minimum of 1 in. thick and provide at least three wall and pilaster panel brackets.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

14. Attribute: Urinal screen.

Criteria: Panel is to be minimum of 2 ft 0 in. depth x 4 ft 10 in. high x 1 1/4 in. thick. Panel is set approximately 1 ft 0 in. above floor.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_

15. Attribute: Shower stall.

Criteria: Panel shall be minimum 1 in. thick.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_

16. Attribute: Curtain rod support.

Criteria: Design of curtain rod shall be to support a 300 lb concentrated load at mid-span with no impact factor.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_

17. Attribute: Shower dressing alcove.

Criteria: Floor supports for the shower partition, if used, shall permit drainage, and resist minimum 60 ft-lb impact load.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_

18. Attribute: Bench for shower dressing alcove.

Criteria: Dimensioned to accomplish seating and placement of personal articles, height approximately 1 ft 6 in.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_

19. Attribute: Coat hook.

Criteria: Mount approximately 5 ft 4 in. above floor.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

20. Attribute: Physically handicapped grab bar.

Criteria: Reference specification 7.2.7.4 for stated requirements.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

21. Attribute: Utility space storage shelving.

Criteria: Shelving and its support shall be strong enough to hold the weight of normal supplies weighing not more than 30 lb.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

22. Attribute: Heating system grills.

Criteria: Shall withstand an impact energy of 60 ft-lb.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_



*Mechanical and Plumbing*

**A. General**

1. Attribute: Interchangeability of replacement parts.

Criteria: Suppliers shall use parts and components standard in the industry, to the extent of adequate availability from other manufacturers.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

2. Attribute: Heating interior.

Criteria: Capability to heat the toilet rooms and shower rooms to 50°F, utility space to 35°F. Heating system shall maintain the required temperature at an outside design temperature of -15°F.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

3. Attribute: Heating system.

Criteria: The heating system shall be designed to furnish hot air to the building units. Where heating of the building unit is not required, spare electric capability shall be provided in panel boards to permit heating unit at a later date.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

4. Attribute: Plumbing system.

Criteria: System shall be designed and installed to conform to the plumbing codes for any of the states in which they are to be installed. Most stringent code shall be used.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

5. Attribute: Piping requirements.

Criteria: Reference specifications 9.3 for stated requirements.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

6. Attribute: Water cut-off valve.

Criteria: Each fixture shall have water cut-off valve so as to be inaccessible to the public.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

#### *Functional Space Utilization*

##### **A. General**

1. Attribute: Accessible and usable by physically handicapped.

Criteria: The requirements of ANSI #A117.1 shall be met.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

2. Attribute: Floor to ceiling height.

Criteria: The facility floor to ceiling height shall not be less than 8 ft.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

3. Attribute: Aisle space.

Criteria: Minimum aisle space is established by meeting the requirements of physically handicapped per ANSI A117.1.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

4. Attribute: Toilet stall.

Criteria: Toilet stall shall be minimum of 4 ft 9 in. long by 2 ft 8 in. wide, except for physically handicapped which shall be at least 4 ft 9 in. long x 3 ft 2 in. wide.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

5. Attribute: Showers.

Criteria: Showers shall be at least 3 ft 0 in. x 3 ft 0 in.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

6. Attribute: Toilet mirror.

Criteria: Provide minimum of 24 in. wide by 36 in. high, highly polished stainless steel mirror approximately 3 ft 6 in. above floor.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

7. Attribute: Utility space storage shelving.

Criteria: Minimum 30 sq ft of shelf area with top shelf at maximum height of 6 ft 0 in. Minimum shelf depth shall be 1 ft 0 in. and maximum depth to be 1 ft 6 in.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

*Security and Vandal-Resistance*

**A. General**

1. Attribute: Spatial considerations.

Criteria: The proposed facility should have a layout that (1) insures the maximum safety for the user, (2) permits security to be maintained in and around the building.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

2. Attribute: Vandal-resistant plumbing fixtures.

Criteria: Reference specifications sections 4.6.4 for list of required fixtures.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

3. Attribute: Constructed and equipped to withstand malicious abuse.

Criteria: All connections and fastenings must be concealed. Where this is not possible, tamper-proof hardware must be indicated and used.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

4. Attribute: Lock-up shutdown capability.

Criteria: All exterior openings, including doors, windows, and louvers should be capable of being enclosed and made secure with tamper-proof hardware and hardware locksets which conform to Federal Specification FF-H-106A.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_



5. Attribute: Key-alike system exterior doors.

Criteria: Locksets and cores for a particular project shall be of a key-alike system for all exterior doors on a facility.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

6. Attribute: Items not accessible to the public.

Criteria: Piping, utility controls, heating and ventilating equipment shall not be accessible to the public.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

7. Attribute: Vandal-resistant plumbing fixtures.

Criteria: Reference specifications section 4.6.4 for list of required fixtures.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

8. Attribute: Coat hook.

Criteria: Mounting shall be especially vandal-resistant.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

9. Attribute: Toilet paper roll.

Criteria: Mounting shall be highly vandal-resistant.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

10. Attribute: Toilet mirror.

Criteria: Must be installed with vandal-resistant attachments.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

11. Attribute: Heating system.

Criteria: System shall be located so it will be accessible only to maintenance personnel. Thermostats shall not be accessible to public. Grills shall be secured with tamper-proof screws or through bolts.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

#### *Materials*

##### **A. General**

1. Attribute: Moisture-resistant.

Criteria: Material surfaces exposed to moisture conditions should be of the type or treatment to resist the deleterious effects of moisture.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

2. Attribute: Life expectancy of 25 years.

Criteria: Material used in the construction of the facility must have the properties to resist wind, moisture, weathering, abrasion, impact, puncture, discoloration, corrosion, and vermin.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

3. Attribute: U-factor exterior walls.

Criteria: Exterior walls shall meet .20 "U" factor for winter conditions. (Reference 3.2.1.2; an estimate should be based on descriptive information supplied in proposal.)

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

4. Attribute: U-factor floor.

Criteria: Floor system shall meet .34 "U" factor for winter conditions. (Reference 3.3.4; an estimate should be based on descriptive information supplied in proposal.)

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

5. Attribute: U-factor roof.

Criteria: Roof shall meet .20 "U" factor for winter conditions. (Reference 3.4.1; an estimate shall be based on descriptive information supplied in proposal.)

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

6. Attribute: Minimize required painting.

Criteria: Where painting is required, proposer shall indicate the type of paints to be used and number of coats. Painting must not be required more often than every 5 years.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

7. Attribute: Texture.

Criteria: Material shall provide for low maintenance and washable cleaning.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

8. Attribute: Partition floor support.

Criteria: Floor supports, if provided, will have non-corrosive finish.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

9. Attribute: Exposed ceilings.

Criteria: Ceilings exposed to the public shall be finished and provide for low maintenance and washable cleaning.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

10. Attribute: Floor coverings.

Criteria: Protective floor and base coating shall be a two-component epoxy formulation and shall meet requirements of the Military Specifications MIL-P-24441 or Federal Specifications TT-C-535.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

11. Attribute: Wall protection.

Criteria: Walls must be protective to hose-down cleaning, on lower portion of the wall of approximately 4 feet.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

12. Attribute: Door frames.

Criteria: Material and construction shall be strong enough to resist anticipated high abuse and impact loading at these facilities (Reference specifications 5.2.1 for specific requirements).

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

13. Attribute: Door.

Criteria: Reference specifications 5.3.1 through 5.3.4 for specific requirements.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_

14. Attribute: Shower curtain.

Criteria: Showers will have provisions for curtains.

Responsive \_\_\_\_\_ Nonresponsive \_\_\_\_\_

Reason \_\_\_\_\_

\_\_\_\_\_



## Evaluation Document IV

### Instructions

The contracting officer, upon receipt of the aesthetic and design evaluation should complete the cumulative rating sheet which follows to determine the responsiveness of the design. A proposer's design will be deemed nonresponsive if: (a) three or more evaluators indicate an area of design is nonresponsive, or (b) the total sum of evaluation's indicators, identifying areas of design as nonresponsive, is equal to 1.75 times the number of design areas. All numerical calculations with decimal values are to be rounded off to the next highest value.

|    | A/D board<br>member #1 | A/D board<br>member #2 | A/D board<br>member #3 | A/D board<br>member #4 | A/D board<br>member #5 | Number of<br>nonresponsive<br>indicators per<br>attribute area |
|----|------------------------|------------------------|------------------------|------------------------|------------------------|--|
| A1 |                        |                        |                        |                        |                        |  |
| 2  |                        |                        |                        |                        |                        |  |
| 3  |                        |                        |                        |                        |                        |  |
| 4  |                        |                        |                        |                        |                        |  |
| 5  |                        |                        |                        |                        |                        |  |
| 6  |                        |                        |                        |                        |                        |  |
| 7  |                        |                        |                        |                        |                        |  |
| 8  |                        |                        |                        |                        |                        |  |
| B1 |                        |                        |                        |                        |                        |  |
| 2  |                        |                        |                        |                        |                        |  |
| 3  |                        |                        |                        |                        |                        |  |
| 4  |                        |                        |                        |                        |                        |  |
| 5  |                        |                        |                        |                        |                        |  |
| 6  |                        |                        |                        |                        |                        |  |
| C1 |                        |                        |                        |                        |                        |  |
| 2  |                        |                        |                        |                        |                        |  |
| 3  |                        |                        |                        |                        |                        |  |
| 4  |                        |                        |                        |                        |                        |  |
| 5  |                        |                        |                        |                        |                        |  |
| 6  |                        |                        |                        |                        |                        |  |
| 7  |                        |                        |                        |                        |                        |  |
| 8  |                        |                        |                        |                        |                        |  |

|    |  |  |  |  |  |   |
|----|--|--|--|--|--|---|
| 9  |  |  |  |  |  |   |
| 10 |  |  |  |  |  |   |
| 11 |  |  |  |  |  |   |
| 12 |  |  |  |  |  |   |
| 13 |  |  |  |  |  |   |
| 14 |  |  |  |  |  |   |
| 15 |  |  |  |  |  |   |
| 16 |  |  |  |  |  |   |
| 17 |  |  |  |  |  |   |
| 18 |  |  |  |  |  |   |
| 19 |  |  |  |  |  |   |
|    |  |  |  |  |  | a. Cumulative nonresponsive area indicators |
|    |  |  |  |  |  | b. Number aesthetic/design areas x 1.75     |
|    |  |  |  |  |  | c. Subtract b from a                        |

NOTE:

If value shown in c is positive, *or* the number of non-responsive indicators in an attribute area is 3 or more, check nonresponsive; otherwise, check responsive.

- ☐ Responsive according to Aesthetic/Design Board.
- ☐ Nonresponsive according to Aesthetic/Design Board.

## **2 STEP-TWO DOCUMENTATION**

This section provides Step-Two documentation for industrialized building of sanitary facilities and is divided into 12 parts.

1. Contract form and representations, certifications, and other statements of offeror (pp 68-70).
2. Instructions, conditions, and notices to offerors (pp 71-84).
3. Evaluation and award factors (pp 85-86).
4. Supplies/services and prices (pp 87-88).
5. Description/specifications (p 89).
6. Preservation/packaging/packing (p 90).
7. Deliveries or performance (p 90).
8. Inspection and acceptance (pp 90, 91-92).
9. Special provisions (pp 93-113).
10. Contract administration data (p 114).
11. General provisions (p 115).
12. List of documents and attachments (p 116).

|   |  |  |  |   |  |                                     |  |
|---|--|--|--|---|--|-------------------------------------|--|
| STANDARD FORM 33, NOV. 1969<br>GENERAL SERVICES ADMINISTRATION<br>FED. PROC. REG. (41 CFR) 101-11.6   |  | <b>SOLICITATION, OFFER,<br/>AND AWARD</b>  |  | 3. CERTIFIED FOR NATIONAL DEFENSE UNDER<br>DOSA REG. 2 AND/OR DMS REG. 1.   |  | 4. PAGE<br><b>1</b>                 |  |
| 1. CONTRACT (Proc. Inv. Ident.) NO.   |  | 2. SOLICITATION NO.<br><b>DACW27-75 B-0089</b><br><input checked="" type="checkbox"/> ADVERTISED (IFB) <input type="checkbox"/> NEGOTIATED (RFP) |  | 5. DATE ISSUED<br><b>75 SEP 09</b>  |  | 6. REQUISITION/PURCHASE REQUEST NO. |  |
| 7. ISSUED BY<br><b>U. S. Army Engineer District, Louisville<br/>Corps of Engineers<br/>600 Federal Place<br/>Louisville, Kentucky 40202</b> |  |  |  | 8. ADDRESS OFFER TO (If other than Block 7)<br><b>U. S. Army Engineer District, Louisville<br/>Corps of Engineers<br/>P. O. Box 59<br/>Louisville, Kentucky 40201</b> |  |                                     |  |

**SOLICITATION**

\* Sealed offers in original and 2 copies for furnishing the supplies or services described in the Schedule will be received at the place specified in block 8, OR IF HAND-CARRIED IN THE DEPOSITORY LOCATED IN Room 821, 600 Federal Place until 2:00 PM, Local Time 75 SEP 30. If this is an advertised solicitation, offers will be publicly opened at that time. CAUTION—LATE OFFERS See par. 8 of Solicitation Instructions and Conditions.

- All offers are subject to the following:
1. The attached Solicitation Instructions and Conditions, SF 33-A.
  2. The General Provisions, ~~XXXXXX~~ **2371** Edition, which is attached or incorporated herein by reference (Rev 28 Jul 75).
  3. The Schedule included below and/or attached hereto.
  4. Such other provisions, representations, certifications, and specifications as are attached or incorporated herein by reference. (Attachments are listed in the Schedule.)

FOR INFORMATION CALL (Name and Telephone No.) (No collect calls) **Joseph Theobald AC 502-582-5598**

**TABLE OF CONTENTS**

*The following checked sections are contained in the contract.*

| (X) | Sec.  | Page | (X) | Sec.   | Page |
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**OFFER (NOTE: Reverse Must Also Be Fully Completed by Offeror)**

In compliance with the above, the undersigned offers and agrees, if this offer is accepted within 45 calendar days (~~XXXXXX~~) from the date for receipt of offers specified above, to furnish any or all items upon which prices are offered, at the price set opposite each item, delivered at the designated point(s), within the time specified in the Schedule. (See section C Par 11)

|   |                    |   |                 |
|---|--------------------|---|-----------------|
| 16. DISCOUNT FOR PROMPT PAYMENT (See Par. 9 of SF 33-A)   |                    |   |                 |
| % 10 CALENDAR DAYS  | % 20 CALENDAR DAYS | % 30 CALENDAR DAYS  | % CALENDAR DAYS |
| 17. OFFEROR<br>NAME & ADDRESS<br>(Street, city,<br>county, state,<br>ZIP Code)<br><br>Area Code and Telephone No. |                    | 18. NAME AND TITLE OF PERSON AUTHORIZED<br>TO SIGN OFFER (Type or Print)<br><br>19. SIGNATURE<br>20. OFFER DATE |                 |
| <input type="checkbox"/> Check If Remittance Address Is Different From Above. Enter Such Address In Schedule.     |                    |   |                 |

**AWARD (To Be Completed By Government)**

|   |  |  |  |   |  |
|---|--|--|--|---|--|
| 21. ACCEPTED AS TO ITEMS NUMBERED   |  | 22. AMOUNT   |  | 23. ACCOUNTING AND APPROPRIATION DATA<br><b>See Section K</b>   |  |
| 24. SUMMARY CHOICES (4 copies unless otherwise specified) TO ADDRESS SHOWN IN<br>BLOCK <b>See Section K</b> |  | 25. NEGOTIATED <input type="checkbox"/> PURSUANT TO <input type="checkbox"/> |  | 26. U.S.C. 2304(a)(2) <input type="checkbox"/> U.S.C. 252(c)(2) <input type="checkbox"/>  |  |
| 27. ADMINISTERED BY<br>(If other than block 7)  |  | CODE   |  | 28. PAYMENT WILL BE MADE BY<br><b>Disbursing Officer, Ohio River Division<br/>Finance &amp; Accounting Center<br/>Corps of Engineers<br/>P. O. Box 27168, Madisonville Station<br/>Cincinnati, Ohio 45227</b> |  |
| 29. NAME OF CONTRACTING OFFICER (Type or Print)   |  | 30. UNITED STATES OF AMERICA   |  | 31. AWARD DATE  |  |
| BY _____<br>(Signature of Contracting Officer)  |  |  |  |   |  |

# REPRESENTATIONS, CERTIFICATIONS, AND ACKNOWLEDGMENTS

The Offeror represents and certifies as part of his offer that: (Check or complete all applicable boxes or blocks.)

## 1. SMALL BUSINESS (See par. 14 on SF 33-A.)

He ☐ is, ☐ is not, a small business concern. If offeror is a small business concern and is not the manufacturer of the supplies offered, he also represents that all supplies to be furnished hereunder ☐ will, ☐ will not, be manufactured or produced by a small business concern in the United States, its possessions, or Puerto Rico.

## 2. REGULAR DEALER—MANUFACTURER (Applicable only to supply contracts exceeding \$10,000.)

He is a ☐ regular dealer in, ☐ manufacturer of, the supplies offered.

## 3. CONTINGENT FEE (See par. 15 on SF 33-A.)

(a) He ☐ has, ☐ has not, employed or retained any company or person (other than a full-time bona fide employee working solely for the offeror) to solicit or secure this contract, and (b) he ☐ has, ☐ has not, paid or agreed to pay any company or person (other than a full-time bona fide employee working solely for the offeror) any fee, commission, percentage, or brokerage fee contingent upon or resulting from the award of this contract, and agrees to furnish information relating to (a) and (b) above, as requested by the Contracting Officer (For interpretation of the representation, including the term "bona fide employee," see Code of Federal Regulations, Title 41, Subpart 1-1.5.)

## 4. TYPE OF BUSINESS ORGANIZATION

He operates as ☐ an individual, ☐ a partnership, ☐ a nonprofit organization, ☐ a corporation, incorporated under the laws of the State of \_\_\_\_\_

## 5. AFFILIATION AND IDENTIFYING DATA (Applicable only to advertised solicitations.)

Each offeror shall complete (a) and (b) if applicable, and (c) below:

(a) He ☐ is, ☐ is not, owned or controlled by a parent company. (See par. 16 on SF 33-A.)

(b) If the offeror is owned or controlled by a parent company, he shall enter in the blocks below the name and main office address of the parent company:

Name of Parent company and main office address \_\_\_\_\_

(include ZIP Code) \_\_\_\_\_

(c) Employer's identification number (See par. 17 on SF 33-A.) \_\_\_\_\_

(Offeror's E.I. No.)

(Parent Company's E.I. No.)

## 6. EQUAL OPPORTUNITY

He ☐ has, ☐ has not, participated in a previous contract or subcontract subject either to the Equal Opportunity clause herein or the clause originally contained in section 301 of Executive Order No. 10925, or the clause contained in section 201 of Executive Order No. 11114, that he ☐ has, ☐ has not, filed all required compliance reports, and that representations indicating submission of required compliance reports, signed by proposed subcontractors, will be obtained prior to subcontract awards. (The above representation need not be submitted in connection with contracts or subcontracts which are exempt from the clause.)

## 7. BUY AMERICAN CERTIFICATE

The offeror hereby certifies that each end product, except the end products listed below, is a domestic source end product (as defined in the clause entitled "Buy American Act"), and that components of unknown origin have been considered to have been mined, produced, or manufactured outside the United States.

EXCLUDED END PRODUCTS

COUNTRY OF ORIGIN

## 8. CERTIFICATION OF INDEPENDENT PRICE DETERMINATION (See par. 18 on SF 33-A.)

(a) By submission of this offer, the offeror certifies, and in the case of a joint offer, each party thereto certifies as to its own organization, that in connection with this procurement:

(1) The prices in this offer have been arrived at independently, without consultation, communication, or agreement, for the purpose of restricting competition, as to any matter relating to such prices with any other offeror or with any competitor.

(2) Unless otherwise required by law, no prices which have been quoted in this offer have not been knowingly disclosed by the offeror and will not knowingly be disclosed by the offeror prior to opening in the case of an advertised procurement or prior to award in the case of a negotiated procurement, directly or indirectly to any other offeror or to any competitor, and

(3) No attempt has been made or will be made by the offeror to induce any other person or firm to submit or not to submit an offer for the purpose of restricting competition.

(b) Each person signing this offer certifies that:

(1) He is the person in the offeror's organization responsible within that organization for the decision as to the prices being offered herein and that he has not participated, and will not participate, in any action contrary to (a) (1) through (a) (3) above, or

(2) (i) He is not the person in the offeror's organization responsible within that organization for the decision as to the prices being offered herein but that he has been authorized in writing to act as agent for the persons responsible for such decision in certifying that such persons have not participated, and will not participate, in any action contrary to (a) (1) through (a) (3) above, and as their agent does hereby so certify, and (ii) he has not participated, and will not participate, in any action contrary to (a) (1) through (a) (3) above.

## 9. CERTIFICATION OF NONSEGREGATED FACILITIES

(Applicable to (1) contracts, (2) subcontracts, and (3) agreements with applicants who are themselves performing federally assisted construction contracts, exceeding \$10,000 which are not exempt from the provisions of the Equal Opportunity clause.)

By the submission of this bid, the bidder, offeror, applicant, or subcontractor certifies that he does not maintain or provide for his employees any segregated facilities at any of his establishments, and that he does not permit his employees to perform their services at any location, under his control, where segregated facilities are maintained. He certifies further that he will not maintain or provide for his employees any segregated facilities at any of his establishments, and that he will not permit his employees to perform their services at any location, under his control, where segregated facilities are maintained. The bidder, offeror, applicant, or subcontractor agrees that a breach of this certification is a violation of the Equal Opportunity clause in this contract. As used in this certification, the term "segregated facilities" means any waiting rooms, work areas, rest rooms and wash rooms, restaurants and other eating areas, time clocks, locker rooms and other storage or dressing areas, parking lots, drinking fountains, recreation or entertainment areas, transportation, and housing facilities provided for employees which are segregated by explicit directive or are in fact segregated on the basis of race, color, religion or national origin, because of habit, local custom, or otherwise. He further agrees that except where he has obtained identical certifications from proposed subcontractors for specific time periods, he will obtain identical certifications from proposed subcontractors prior to the award of subcontracts exceeding \$10,000 which are not exempt from the provisions of the Equal Opportunity clause. He will retain such certifications in his files, and that he will, upward the following notice to such proposed subcontractors, exact where the proposed subcontractors have submitted identical certifications for specific time periods:

Notice to proposed subcontractors of requirement for certifications of nonsegregated facilities.

A Certification of Nonsegregated Facilities must be submitted prior to the award of a subcontract exceeding \$10,000 which is not exempt from the provisions of the Equal Opportunity clause. The certification may be submitted either for each subcontract or for all subcontracts during a period (i.e., quarterly, semiannually or annually). NOTE: The penalty for making false statements in offers is prescribed in 18 U.S.C. 1001.

## ACKNOWLEDGMENT OF AMENDMENTS

The offeror acknowledges receipt of amendments to the Solicitation for Offers and related documents, numbered and dated as follows:

| AMENDMENT NO. | DATE | AMENDMENT NO. | DATE |
|---------------|------|---------------|------|
|               |      |               |      |
|               |      |               |      |

NOTE—Offers must set forth full, accurate, and complete information as required by this Solicitation (including attachments). The penalty for making false statements in offers is prescribed in 18 U.S.C. 1001.



## REPRESENTATIONS, CERTIFICATIONS, AND ACKNOWLEDGMENTS (Cont'd)

### 10. AFFIRMATIVE ACTION PROGRAM (1970 AUG)

(The following certification shall be completed by each offeror whose offer is \$50,000 or more and who has 50 employees or more) The Offeror certifies that he [ ] has, [ ] has not, developed and maintained at each of his establishments Equal Opportunity Affirmative Action Programs, pursuant to 41 CFR 60.2. (ASPR 12-806(b)(2))

### 11. CERTIFICATION OF EQUAL EMPLOYMENT COMPLIANCE (1971 APR)

By submission of this offer the offeror certifies that, to the best of his knowledge and belief except as noted below, up to the date of this offer no written notice such as a show cause letter, a letter indicating probable cause, or any other formal written notification citing specific deficiencies, has been received by the offeror from any Federal Government agency or representative thereof that the offeror or any of its divisions or affiliates or known first-tier subcontractors is in violation of any of the provisions of Executive Order No. 11246 of September 24, 1965, Executive Order No. 11375 of October 13, 1967, or rules and regulations of the Secretary of Labor (41 CFR, Chapter 60) and specifically as to not having an acceptable affirmative action program or being in noncompliance with any other aspect of the Equal Employment Opportunity Program. It is further certified and agreed that should there be any change in the status of circumstances certified to above between this date and the date of expiration of this offer or any extension thereof, the Government Contracting Officer cognizant of this procurement will be notified forthwith promptly. (ASPR 12-806(b)(3))

### 12. CLEAN AIR AND WATER CERTIFICATION (1975 JUL)

(Applicable if the bid or offer exceeds \$100,000, or the Contracting Officer has determined that orders under an indefinite quantity contract in any year will exceed \$100,000, or a facility to be used has been the subject of a conviction under the Clean Air Act (42 U.S.C. 1857c-8(c)(1)) or the Federal Water Pollution Control Act (33 U.S.C. 1319(c)) and is listed by EPA, or is not otherwise exempt.)

The Bidder or offeror certifies as follows:

(a) Any facility to be utilized in the performance of this proposed contract has , has not , been listed on the Environmental Protection Agency List of Violating Facilities.

(b) He will promptly notify the Contracting Officer, prior to award, of the receipt of any communication from the Director, Office of Federal Activities, U.S. Environmental Protection Agency, indicating that any facility which he proposes to use for the performance of the contract is under consideration to be listed on the EPA Lists of Violating Facilities.

(c) He will include substantially this solicitation certification, including this paragraph (c), in every nonexempt subcontract.

Solicitation No. DACW27-75-B-0089

Part I

SECTION C - Instructions, Conditions and Notices to Bidder

1. Standard Form 33A
2. Special Instructions
3. Bid Quantities
4. Award
5. Pre-Award on Site Equal Opportunity Compliance Review
6. Payments
7. Discounts
8. Progress Payments
9. Late Bids, Modifications of Bids or Withdrawal of Bids (1973 Jul)
10. Information Regarding Bidding Material, Bid Guarantee and Bonds
11. Minimum Acceptance Period (1975 Mar)
12. Arithmetic Discrepancies
13. Funds Available for Payments
14. Warranty of Supplies

## SOLICITATION INSTRUCTIONS AND CONDITIONS

### 1. DEFINITIONS.

As used herein:

- (a) The term "solicitation" means Invitation for Bids (IFB) where the procurement is advertised, and Request for Proposal (RFP) where the procurement is negotiated.
- (b) The term "offer" means bid where the procurement is advertised, and proposal where the procurement is negotiated.
- (c) For purposes of this solicitation and Block 2 of Standard Form 33, the term "advertised" includes Small Business Restricted Advertising and other types of restricted advertising.

### 2. PREPARATION OF OFFERS.

- (a) Offerors are expected to examine the drawings, specifications, Schedule, and all instructions. Failure to do so will be at the offeror's risk.
- (b) Each offeror shall furnish the information required by the solicitation. The offeror shall sign the solicitation and print or type his name on the Schedule and each Continuation Sheet thereof on which he makes an entry. Erasures or other changes must be initialed by the person signing the offer. Offers signed by an agent are to be accompanied by evidence of his authority unless such evidence has been previously furnished to the issuing office.
- (c) Unit price for each unit offered shall be shown and such price shall include packing unless otherwise specified. A total shall be entered in the Amount column of the Schedule for each item offered. In case of discrepancy between a unit price and extended price, the unit price will be presumed to be correct, subject, however, to correction to the same extent and in the same manner as any other mistake.
- (d) Offers for supplies or services other than those specified will not be considered unless authorized by the solicitation.
- (e) Offeror must state a definite time for delivery of supplies or for performance of services unless otherwise specified in the solicitation.
- (f) Time, if stated as a number of days, will include Saturdays, Sundays and holidays.
- (g) Code boxes are for Government use only.

**3. EXPLANATION TO OFFERORS.** Any explanation desired by an offeror regarding the meaning or interpretation of the solicitation, drawings, specifications, etc., must be requested in writing and with sufficient time allowed for a reply to reach offerors before the submission of their offers. Oral explanations or instructions given before the award of the contract will not be binding. Any information given to a prospective offeror concerning a solicitation will be furnished to all prospective offerors as an amendment of the solicitation, if such information is necessary to offerors in submitting offers on the solicitation or if the lack of such information would be prejudicial to uninformed offerors.

**4. ACKNOWLEDGMENT OF AMENDMENTS TO SOLICITATIONS.** Receipt of an amendment to a solicitation by an offeror must be acknowledged (a) by signing and returning the amendment, (b) on the reverse of Standard Form 33, or (c) by letter or telegram. Such acknowledgment must be received prior to the hour and date specified for receipt of offers.

### 5. SUBMISSION OF OFFERS.

- (a) Offers and modifications thereof shall be enclosed in sealed envelopes and addressed to the office specified in the solicitation. The offeror shall show the hour and date specified in the solicitation for receipt, the solicitation number, and the name and address of the offeror on the face of the envelope.
- (b) Telegraphic offers will not be considered unless authorized by the solicitation; however, offers may be modified by telegraphic notice, provided such notice is received prior to the hour and date specified for receipt. (However, see par. 8.)
- (c) Samples of items, when required, must be submitted within the time specified, and unless otherwise specified by the Government, at no expense to the Government. If not destroyed by testing, samples will be returned at offeror's request and expense, unless otherwise specified by the solicitation.

**6. FAILURE TO SUBMIT OFFER.** If no offer is to be submitted, do not return the solicitation unless otherwise specified. A letter or postcard should be sent to the issuing office advising whether future solicitations for the type of supplies or services covered by this solicitation are desired. Failure of the recipient to offer, or to notify the issuing office that future solicitations are desired, may result in removal of the name of such recipient from the mailing list for the type of supplies or services covered by the solicitation.

### 7. MODIFICATION OR WITHDRAWAL OF OFFERS.

- (a) If this solicitation is advertised, offers may be modified or withdrawn by written or telegraphic notice received prior to the exact hour and date specified for receipt of offers. An offer also may be withdrawn in person by an offeror or his authorized representative, provided his identity is made known and he signs a receipt for the offer, but only if the withdrawal is made prior to the exact hour and date set for receipt of offers. (However, see par. 8.)
- (b) If this solicitation is negotiated, offers may be modified (subject to par. 8, when applicable) or withdrawn by written or telegraphic notice received at any time prior to award. Offers may be withdrawn in person by an offeror or his authorized representative, provided his identity is made known and he signs a receipt for the offer prior to award.

**8. LATE OFFERS AND MODIFICATIONS OR WITHDRAWALS.** (This paragraph applies to all advertised solicitations. In the case of Department of Defense negotiated solicitations, it shall also apply to late offers and modifications (other than the normal revisions of offers by selected offerors during the usual conduct of negotiations with such offerors) but not to withdrawals of offers. Unless otherwise provided, this paragraph does not apply to negotiated solicitations issued by civilian agencies.)

- (a) Offers and modifications of offers (or withdrawals thereof, if this solicitation is advertised) received at the office designated in the solicitation after the exact hour and date specified for receipt will not be considered unless: (1) they are received before award is made; and either (2) they are sent by registered mail, or by certified mail for which an official dated post office stamp (postmark) on the original Receipt for Certified Mail has been obtained and it is determined by the Government that the late receipt was due solely to delay in the mails for which the offeror was not responsible; or (3) if submitted by mail (or by telegram if authorized) it is determined by the Government that the late receipt was due solely to misrouting by the Government after receipt at the Government installation; provided, that timely receipt at such installation is established upon examination of an appropriate date or time stamp (if any) of such installation, or of other documentary evidence of receipt (if readily available) within the control of such installation or of the post office serving it. However, a modification of an offer which makes the terms of an otherwise successful offer more favorable to the Government will be considered at any time it is received and may thereafter be accepted.

- (b) Offerors using certified mail are cautioned to obtain a Receipt for Certified Mail showing a legible, dated postmark and to retain such receipt against the chance that it will be required as evidence that a late offer was timely mailed.

- (c) The time of mailing of late offers submitted by registered or certified mail shall be deemed to be the last minute of the date shown in the postmark on the registered mail receipt or registered mail wrapper or on the Receipt for Certified Mail unless the offeror furnishes evidence from the post office station of mailing which establishes an earlier time. In the case of certified mail, the only acceptable evidence is as follows: (1) where the Receipt for Certified Mail identifies the post office station of mailing, evidence furnished by the offeror which establishes that the business day of that station ended at an earlier time, in which case the time of mailing shall be deemed to be the last minute of the business day of that station; or (2) an entry in ink on the Receipt for Certified Mail showing the time of mailing and the initials of the postal employee receiving the item and making the entry, with appropriate written verification of such entry from the post office station of mailing, in which case the time of mailing shall be the time shown in the entry. If the postmark on the original Receipt for Certified Mail does not show a date, the offer shall not be considered.

**9. DISCOUNTS.** (a) Notwithstanding the fact that a blank is provided for a ten (10) day discount, prompt payment discounts offered for payment within less than twenty (20) calendar days will not be considered in evaluating offers for award, unless otherwise specified in the solicitation. However, offered discounts of less than 20 days will be taken if payment is made within the discount period, even though not considered in the evaluation of offers.

- (b) In connection with any discount offered, time will be computed from date of delivery of the supplies to carrier when delivery and acceptance are at point of origin, or from date of delivery at destination or port of embarkation when delivery and

acceptance are at either of those points, or from the date correct invoice or voucher is received in the office specified by the Government, if the latter date is later than date of delivery. Payment is deemed to be made for the purpose of earning the discount on the date of mailing of the Government check.

**10. AWARD OF CONTRACT.** (a) The contract will be awarded to that responsible offeror whose offer conforming to the solicitation will be most advantageous to the Government, price and other factors considered.

(b) The Government reserves the right to reject any or all offers and to waive informalities and minor irregularities in offers received.

(c) The Government may accept any item or group of items of any offer, unless the offeror qualifies his offer by specific limitation. **UNLESS OTHERWISE PROVIDED IN THE SCHEDULE, OFFERS MAY BE SUBMITTED FOR ANY QUANTITIES LESS THAN THOSE SPECIFIED, AND THE GOVERNMENT RESERVES THE RIGHT TO MAKE AN AWARD ON ANY ITEM FOR A QUANTITY LESS THAN THE QUANTITY OFFERED AT THE UNIT PRICES OFFERED UNLESS THE OFFEROR SPECIFIES OTHERWISE IN HIS OFFER.**

(d) A written award (or Acceptance of Offer) mailed (or otherwise furnished) to the successful offeror within the time for acceptance specified in the offer shall be deemed to result in a binding contract without further action by either party.

The following paragraphs (e) through (h) apply only to negotiated solicitations:

(e) The Government may accept within the time specified therein, any offer (or part thereof, as provided in (c) above), whether or not there are negotiations subsequent to its receipt, unless the offer is withdrawn by written notice received by the Government prior to award. If subsequent negotiations are conducted, they shall not constitute a rejection or counter offer on the part of the Government.

(f) The right is reserved to accept other than the lowest offer and to reject any or all offers.

(g) The Government may award a contract, based on initial offers received, without discussion of such offers. Accordingly, each initial offer should be submitted on the most favorable terms from a price and technical standpoint which the offeror can submit to the Government.

(h) Any financial data submitted with any offer hereunder or any representation concerning facilities or financing will not form a part of any resulting contract; provided, however, that if the resulting contract contains a clause providing for price reduction for defective cost or pricing data, the contract price will be subject to reduction if cost or pricing data furnished hereunder is incomplete, inaccurate, or not current.

**11. GOVERNMENT-FURNISHED PROPERTY.** No material, labor, or facilities will be furnished by the Government unless otherwise provided for in the solicitation.

**12. LABOR INFORMATION.** General information regarding the requirements of the Walsh-Healey Public Contracts Act (41 U.S.C. 35-45), the Contract Work Hours Standards Act (40 U.S.C. 327-330), and the Service Contract Act of 1965 (41 U.S.C. 351-357) may be obtained from the Department of Labor, Washington, D.C. 20210, or from any regional office of that agency. Requests for information should include the solicitation number, the name and address of the issuing agency, and a description of the supplies or services.

**13. SELLER'S INVOICES.** \* Invoices shall be prepared and submitted in quadruplicate (one copy shall be marked "original") unless otherwise specified. Invoices shall contain the following information: Contract and order number (if any); item numbers; description of supplies or services; sizes, quantities, unit prices, and

extended totals. Bill of lading number and weight of shipment will be shown for shipments made on Government bills of lading.

**14. SMALL BUSINESS CONCERN.** A small business concern for the purpose of Government procurement is a concern, including its affiliates, which is independently owned and operated, is not dominant in the field of operation in which it is submitting offers on Government contracts, and can further qualify under the criteria concerning number of employees, average annual receipts, or other criteria, as prescribed by the Small Business Administration. (See Code of Federal Regulations, Title 13, Part 121, as amended, which contains detailed industry definitions and related procedures.)

**15. CONTINGENT FEE.** If the offeror, by checking the appropriate box provided therefor, has represented that he has employed or retained a company or person (other than a full-time bona fide employee working solely for the offeror) to solicit or secure this contract, or that he has paid or agreed to pay any fee, commission, percentage, or brokerage fee to any company or person contingent upon or resulting from the award of this contract, he shall furnish, in duplicate, a complete Standard Form 119, Contractor's Statement of Contingent or Other Fees. If offeror has previously furnished a completed Standard Form 119 to the office issuing this solicitation, he may accompany his offer with a signed statement (a) indicating when such completed form was previously furnished; (b) identifying by number the previous solicitation or contract, if any, in connection with which such form was submitted; and (c) representing that the statement in such form is applicable to this offer.

**16. PARENT COMPANY.** A parent company for the purpose of this offer is a company which either owns or controls the activities and basic business policies of the offeror. To own another company means the parent company must own at least a majority (more than 50 percent) of the voting rights in that company. To control another company, such ownership is not required; if another company is able to formulate, determine, or veto basic business policy decisions of the offeror, such other company is considered the parent company of the offeror. This control may be exercised through the use of dominant minority voting rights, use of proxy voting, contractual arrangements, or otherwise.

**17. EMPLOYER'S IDENTIFICATION NUMBER.** (Applicable only to advertised solicitations.) The offeror shall insert in the applicable space on the offer form, if he has no parent company, his own Employer's Identification Number (E.I. No.) (Federal Social Security Number used on Employer's Quarterly Federal Tax Return, U.S. Treasury Department Form 941), or, if he has a parent company, the Employer's Identification Number of his parent company.

**18. CERTIFICATION OF INDEPENDENT PRICE DETERMINATION.** (a) This certification on the offer form is not applicable to a foreign offeror submitting an offer for a contract which requires performance or delivery outside the United States, its possessions, and Puerto Rico.

(b) An offer will not be considered for award where (a)(1), (a)(3), or (b) of the certification has been deleted or modified. Where (a)(2) of the certification has been deleted or modified, the offer will not be considered for award unless the offeror furnishes with the offer a signed statement which sets forth in detail the circumstances of the disclosure and the head of the agency, or his designee, determines that such disclosure was not made for the purpose of restricting competition.

**19. ORDER OF PRECEDENCE.** In the event of an inconsistency between provisions of this solicitation, the inconsistency shall be resolved by giving precedence in the following order: (a) the Schedule; (b) Solicitation Instructions and Conditions; (c) General Provisions; (d) other provisions of the contract, whether incorporated by reference or otherwise; and (e) the specifications.



PART I - SECTION G

2. Special Instructions to Bidder. This solicitation is Step II of the Two-Step Formal Advertising Process. The Special Provisions in Part II and the General Provisions in Part III include both fabrication and delivery of the buildings (Supply) and for access site preparation, erection, and testing of the buildings (Construction). Progress Payments on Form 1195, if required for the fabrication will be in accordance with Par. 8, Progress Payments for Fabrication. Payment to the Contractor for site preparation, erection and testing of the buildings will be made on Engr Form 93 in accordance with Par. 7, Payments to Contractor, General Provisions, Construction Contract. The General Provisions for the fabrication and delivery are shown in Section L as the General Provisions (Supply Contract). The General Provisions for the erection and testing are shown in Section L as the General Provisions (Construction Contract).

3. Bid Quantities. Bids for less than specified quantities of each item in Section E of the Schedule will not be considered, and failure to submit a unit price for each item where required in the Schedule will be considered as a material deviation from the requirements of the Solicitation, and the bid will be rejected. (ASPR 2-201(a) Sec. C(iv)).

4. Award. Notwithstanding any other provisions of these specifications concerning the method of award, award will be made as a whole to one bidder.

5. Pre-Award On Site Equal Opportunity Compliance Review. (1970 Aug). In accordance with regulations of the Office of Federal Contract Compliance, 41CFR60.1, effective 1 July 1968, an award in the amount of \$1,000,000 or more will not be made under this solicitation unless the bidder and each of his known first-tier subcontractors (to whom he intends to award a sub-contract of \$1,000,000 or more) are found on the basis of a compliance review, to be able to comply with the provisions of the Equal Opportunity clause of this solicitation. (ASPR 2-201(a) Sec. C(x)).

6. Payments. Payments to the Contractor will be made in accordance with General Provision 7, Standard Supply Contract Provisions, for all work other than construction. Payment for construction will be made in accordance with General Provision 7, Construction Contract Provisions. All payments will be made upon submission of an invoice as soon as practicable after completion, inspection and acceptance.

7. Discounts. Subparagraph 9(a) of Standard Form 33A - Offers of discounts for payment in less than ten (10) days will not be considered in evaluating bids.

Subparagraph 9(b) of Standard Form 33A is hereby deleted. (see para. 26 of General Provisions.)

8. Progress Payments for Fabrication (1974 APR) The need for progress payments conforming to regulations (Appendix E, Armed Services Procurement Regulation) will not be considered as a handicap or adverse factor in the award of contracts. Authorized progress payments will not be a factor for evaluation of bids. The appropriate "Progress Payment" clause attached hereto will be included in the contract awarded in the manner herein provided, however, the clause shall be inoperative during the time the Contractor's accounting system and



controls are determined by the Government to be inadequate for segregation and accumulation of contract costs. For Small Business concerns the clause designated "Progress Payments for Small Business Concerns" (7-104.35(b)) shall be used for such Contractors. For Contractors who are not Small Business concerns, the clause designated "Progress Payments for Other Than Small Business Concerns" (7-104.35(a)) shall be used. (ASPR 7-2003.64)

**PROGRESS PAYMENT FOR OTHER THAN SMALL BUSINESS CONCERNS (1974 APR)**

Progress payments shall be made to the Contractor when requested as work progresses, but not more frequently than bi-weekly in amounts approved by the Contracting Officer upon the following terms and conditions:

**(a) Computation of Amounts.**

(1) Unless a smaller amount is requested, each progress payment shall be (i) eighty percent (80%) of the amount of the Contractor's total costs which, except as provided herein with respect to costs of pension contributions, shall include only those recorded costs which result, at the time of the request, from payment made by cash, check, or other form of actual payment for items or services purchased directly for the contract, together with (when the Contractor is not delinquent in payment of costs of contract performance in the ordinary course of business) costs incurred, but not necessarily paid, for materials which have been issued from the Contractor's stores inventory and placed in the production process for use on the contract, for direct labor, for direct travel, for other direct inhouse costs, and for properly allocable and allowable indirect costs, all as shown by records maintained by the Contractor for purposes of obtaining payment under Government contracts plus (ii) the amount of progress payments which have been paid to Contractor's subcontractors and other divisions as provided in (j) below; all less the sum of previous progress payments. With respect to costs of pension contributions, when pension contributions are paid by the Contractor to the retirement fund less frequently than quarterly, accruals of the costs of these pension contributions shall be excluded from Contractor's total costs for progress payment purposes until such costs are paid. If pension contributions are paid on a quarterly or more frequent basis, accruals of the costs of these pension contributions may be included in Contractor's total costs for progress payment purposes provided that the pension contributions are paid to the retirement fund within thirty (30) days after the close of the period covered by the payment. If payments are not made to the fund within such thirty (30) day period, pension contribution costs shall be excluded from Contractor's total costs for progress payment purposes until payment therefor has been made.

(2) The Contractor's total costs ((a)(1)(i)) shall be reasonable, allocable to this contract, and consistent with sound and generally accepted accounting principles and practices. However, such costs shall not include (i) any costs incurred by subcontractors or suppliers, or (ii) any payments or amounts payable to subcontractors or suppliers, except for completed work (including partial deliveries) to which the Contractor has acquired title and except for amounts paid or payable under cost-reimbursement or time and material subcontracts for work to which the Contractor has acquired title, or (iii) costs ordinarily capitalized and subject to depreciation or amortization except for the properly depreciated or amortized portion of such costs.

(3) The amount of unliquidated progress payments shall not exceed the lesser of (i) eighty percent (80%) of the costs mentioned in (a)(1)(i) above, plus any unliquidated progress payments mentioned in item (a)(1)(ii) above, both of which are applicable only to the supplies and services not yet delivered and invoiced to and accepted by the Government, or (ii) 80 percent of the total contract price of supplies and services not yet delivered and invoiced to and accepted by the Government, less unliquidated advance payments.

(4) The aggregate amount of progress payments made shall not exceed eighty percent (80%) of the total contract price.

(5) If at any time a progress payment or the unliquidated progress payments exceed the amount permitted by this paragraph (a), the Contractor shall pay the amount of such excess to the Government upon demand.

(b) *Liquidation.* Except as provided in the clause entitled "Termination for Convenience of the Government," all progress payments shall be liquidated by deducting from any payment under this contract, other than advance or progress, the amount of unliquidated progress payments, or eighty percent\* (80%) (See footnote at end of clause) of the gross amount invoiced, whichever is less. Repayment to the Government required by a retroactive price reduction will be made after calculating liquidations and payments on past invoices at the reduced prices and adjusting the unliquidated progress payments accordingly. The Government reserves the right to unilaterally change from the ordinary liquidation rate to the alternate rate when deemed appropriate for proper contract financing.

(c) *Reduction or Suspension.* The Contracting Officer may reduce or suspend progress payments, or liquidate them at a rate higher than the percentage stated in (b) above, or both, whenever he finds upon substantial evidence that the Contractor (i) has failed to comply with any material requirement of this contract, (ii) has so failed to make progress, or is in such unsatisfactory financial condition, as to endanger performance of this contract, (iii) has allocated inventory to this contract substantially exceeding reasonable requirements, (iv) is delinquent in payment of the costs of performance of this contract in the ordinary course of business, (v) has so failed to make progress that the unliquidated progress payments exceed the fair value of the work accomplished on the undelivered portion of this contract, or (vi) is realizing less profit than the estimated profit used for establishing a liquidation percentage in paragraph (b), if that liquidation percentage is less than the percentage stated in paragraph (a)(1).

(d) *Title.* Immediately, upon the date of this contract, title to all parts, materials, inventories, work in process, special tooling as defined in the clause of this contract entitled "Special Tooling", special test equipment and other special tooling to which the Government is to acquire title pursuant to any other provision of this contract; nondurable (i.e., noncapital) tools, jigs, dies, fixtures, molds, patterns, taps, gauges, test equipment, and other similar manufacturing aids title to which is not obtained as special tooling pursuant to this paragraph; and drawings and technical data (to the extent delivery thereof to the Government is required by other provisions of this contract); theretofore acquired or produced by the Contractor and allocable or properly chargeable to this contract under sound and generally accepted accounting principles and practices shall forthwith vest in the Government; and title to all like property thereafter acquired or produced by the Contractor and allocable or properly chargeable to this contract as aforesaid shall forthwith vest in the Government upon said acquisition, production or allocation. Notwithstanding that title to property is in the Government through the operation of this clause, the handling and disposition of such property shall be determined by the applicable provisions of this contract such as: the Default clause and paragraph (h) of this clause; Termination for Convenience of the Government clause; and the Special Tooling clause. Current production scrap may be sold by the Contractor without approval of the Contracting Officer and the proceeds shall be credited against the costs of contract performance. With the consent of the Contracting Officer and on terms approved by him, the Contractor may acquire or dispose of property to which title is vested in the Government pursuant to this clause, and in that event, the costs allocable to the property so transferred from this contract shall be eliminated from the costs of contract performance and the Contractor shall repay to the Government (by cash or credit memorandum) an amount equal to the unliquidated progress payments allocable to the property so transferred. Upon completion of performance of all the obligations of the Contractor under this contract, including liquidation of all progress payments hereunder, title to all property (or the proceeds thereof) which had not been delivered to, and accepted by the Government under this contract or which had not been incorporated in supplies delivered to and accepted by the Government under this contract and to which title has vested in the Government under this clause shall vest in the Contractor. The provisions of this contract referring to or defining liability for Government-furnished property shall not apply to property to which the Government shall have acquired title solely by virtue of the provisions of this clause.

(e) *Risk of Loss.* Except to the extent that the Government shall have otherwise expressly assumed the risk of loss of property, title to which vests in the Government pursuant to this clause, in the event of the loss, theft or destruction of or damage to any such property before its delivery to and acceptance by the Government, the Contractor shall bear the risk of loss and shall repay the Government an amount equal to the unliquidated progress payments based on costs allocable to such lost, stolen, destroyed or damaged property.

(f) *Control of Costs and Property.* The contractor shall maintain an accounting system and controls adequate for the proper administration of this clause.

(g) *Reports—Access to Records.* Insofar as pertinent to the administration of this clause, the Contractor will (i) furnish promptly such relevant reports, certificates, financial statements, and other information as may be reasonably requested by the Contracting Officer, and (ii) give the Government reasonable opportunity to examine and verify his books, records and accounts.

(h) *Special Provisions Regarding Default.* If this contract is terminated pursuant to the clause entitled "Default," (i) the Contractor shall, upon demand, pay to the Government the amount of unliquidated progress payments and (ii) with respect to all property as to which the Government elects not to require delivery under the clause entitled "Default," title shall vest in the Contractor upon full liquidation of progress payments, and the Government shall be liable for no payment except as provided by the "Default" clause.

(i) *Reservations of Rights.* The rights and remedies of the Government provided in this clause shall not be exclusive, and are in addition to any other rights and remedies provided by law or under this contract. No payment, or vesting of title pursuant to this clause, shall excuse the Contractor from performance of his obligations under this contract, nor constitute a waiver of any of the rights and remedies of the parties under this contract. No delay or failure of the Government in exercising any right, power or privilege under this clause shall affect any such right, power or privilege, nor shall any single or partial exercise thereof preclude or impair any further exercise thereof or the exercise of any other right, power or privilege of the Government.

(j) *Progress Payments to Subcontractors.*

(1) The amounts mentioned in item (a)(1)(ii) above shall be all progress payments paid by the Contractor to his subcontractors or other divisions and remaining unliquidated when under subcontracts or interdivisional orders which conform to (2) below.

(2) Subcontractors or interdivisional orders on which progress payments to subcontractors or other divisions may be included in the base for progress payments pursuant to paragraph (a) of this clause are limited to those subcontracts in which there is expected to be a long "lead time," between the beginning of work and the first delivery, approximating four months or more for small business concerns and six months or more for firms which are not small business concerns, and in which the provisions regarding progress payments (i) are substantially similar to and as favorable to the Government as this "Progress Payment" clause, no more favorable to the subcontractor or the other division than this clause is to the Contractor and on a basis of not more than eighty percent (80%) of total costs (except that in the case of those subcontractors which are small business concerns a "Progress Payment" clause substantially similar to 7-104.35(b) may be used); and (ii) make all rights of the subcontractor with respect to all property to which the Government has title under the subcontract subordinate to the rights of the Government to require delivery of such property to it in the event of default by the Contractor under this contract or in the event of the bankruptcy or insolvency of the subcontractor.

(3) The Government agrees that any proceeds received by it from property to which it has acquired title by virtue of such provisions in any subcontract shall be applied to reduce the amount of unliquidated progress payments made by the Government to the Contractor under this contract. In the event the Contractor fully liquidates such progress payments made by the Government to him hereunder and there are progress payments to any subcontractors which are unliquidated, the Contractor shall be subrogated to all the Government's rights by virtue of such provisions in the subcontract or subcontracts involved as if all such rights had been thereupon assigned and transferred to the Contractor.

(4) To facilitate small business participation in subcontracting under this contract, the Contractor agrees to offer and provide progress payments to those subcontractors which are small business concerns, in conformity with the standards for customary progress payments stated in paragraph 503 of Appendix E of the Armed Services Procurement Regulation, as in effect on the date of this contract. The Contractor further agrees that the need for such progress payments will not be considered as a handicap or adverse factor in the award of subcontracts.

(End of clause)

**PROGRESS PAYMENT FOR SMALL BUSINESS CONCERNS (1973 SEP)**

Progress payments shall be made to the Contractor when requested as work progresses, but not more frequently than bi-weekly, in amounts approved by the Contracting Officer under the following terms and conditions.

**(a) Computation of Amounts.**

(1) Unless a smaller amount is requested, each progress payment shall be (i) eighty-five percent (85%) of the amount of the Contractor's total costs incurred under this contract, except as provided herein with respect to costs of pension contributions, plus (ii) the amount of progress payments to subcontractors as provided in (j) below; all less the sum of previous progress payments. With respect to costs of pension contributions, when pension contributions are paid by the Contractor to the retirement fund less frequently than quarterly, accruals of the costs of these pension contributions shall be excluded from Contractor's total costs for progress payment purposes until such costs are paid. If pension contributions are paid on a quarterly or more frequent basis, accruals of the costs of these pension contributions may be included in Contractor's total costs for progress payment purposes provided that the pension contributions are paid to the retirement fund within thirty (30) days after the close of the period covered by the payment. If payments are not made to the fund within such thirty-day period, pension contribution costs shall be excluded from Contractor's total costs for progress payment purposes until payment therefor has been made.

(2) The Contractor's total costs (a)(1)(i) shall be reasonable, allocable to this contract, and consistent with sound and generally accepted accounting principles and practices. However, such costs shall not include (i) any costs incurred by subcontractors or suppliers, or (ii) any payments or amounts payable to subcontractors or suppliers, except for completed work (including partial deliveries) to which the Contractor has acquired title and except for amounts paid or payable under cost-reimbursement or time and material subcontracts for work to which the Contractor has acquired title, or (iii) costs ordinarily capitalized and subject to depreciation or amortization except for the properly depreciated or amortized portion of such costs.

(3) The amount of unliquidated progress payments shall not exceed the lesser of (i) eighty-five percent (85%) of the costs mentioned in (a)(1)(i) above, plus any unliquidated progress payments mentioned in item (a)(1)(ii) above, both of which are applicable only to the supplies and services not yet delivered and invoiced to and accepted by the Government, or (ii) 85 percent of the total contract price of supplies and services not yet delivered and invoiced to and accepted by the Government, less unliquidated advance payments.

(4) The aggregate amount of progress payments made shall not exceed eighty-five percent (85%) of the total contract price.

(5) If at any time a progress payment or the unliquidated progress payments exceed the amount permitted by this paragraph (a), the Contractor shall pay the amount of such excess to the Government upon demand.

(b) *Liquidation.* Except as provided in the clause entitled "Termination for Convenience of the Government," all progress payments shall be liquidated by deducting from any payment under this contract, other than advance or progress, the amount of unliquidated progress payments, or eighty-five percent\* (85%) of the gross amount invoiced, whichever is less. Repayment to the Government required by a retroactive price reduction will be made after calculating liquidations and payments on past invoices at the reduced prices and adjusting the unliquidated progress payments accordingly.

(c) *Reduction or Suspension.* The Contracting Officer may reduce or suspend progress payments, or liquidate them at a rate higher than the percentage stated in (b) above, or both, whenever he finds upon substantial evidence that the Contractor (i) has failed to comply with any material requirement of this contract, (ii) has so failed to make progress, or is in such unsatisfactory financial condition, as to endanger performance of this contract, (iii) has allocated inventory to this contract substantially exceeding reasonable requirements, (iv) is delinquent in payment of

the costs of performance of this contract in the ordinary course of business, (v) has so failed to make progress that the unliquidated progress payments exceed the fair value of the work accomplished on the undelivered portion of this contract, or (vi) is realizing less profit than the estimated profit used for establishing a liquidation percentage in paragraph (b), if that liquidation percentage is less than the percentage stated in paragraph (a)(1).

(d) *Title.* Immediately, upon the date of this contract, title to all parts, materials, inventories, work in process, special tooling as defined in this clause of this contract entitled "Special Tooling"; special test equipment and other special tooling to which the Government is to acquire title pursuant to any other provision of this contract; nondurable (i.e., noncapital) tools, jigs, dies, fixtures, molds, patterns, taps, gauges, test equipment, and other similar manufacturing aids title to which is not obtained as special tooling pursuant to this paragraph; and drawings and technical data (to the extent delivery thereof to the Government is required by other provisions of this contract); theretofore acquired or produced by the Contractor and allocable or properly chargeable to this contract under sound and generally accepted accounting principles and practices shall forthwith vest in the Government; and title to all like property thereafter acquired or produced by the Contractor and allocable or properly chargeable to this contract as aforesaid shall forthwith vest in the Government upon said acquisition, production or allocation. Notwithstanding that title to property is in the Government through the operation of this clause, the handling and disposition of such property shall be determined by the applicable provisions of this contract such as: the Default clause and paragraph (h) of this clause; Termination for Convenience of the Government clause; and the Special Tooling clause. Current production scrap may be sold by the Contractor without approval of the Contracting Officer and the proceeds shall be credited against the costs of contract performance. With the consent of the Contracting Officer and on terms approved by him, the Contractor may acquire or dispose of property to which title is vested in the Government pursuant to this clause, and in that event, the costs allocable to the property so transferred from this contract shall be eliminated from the costs of contract performance and the Contractor shall repay to the Government (by cash or credit memorandum) an amount equal to the unliquidated progress payments allocable to the property so transferred. Upon completion of performance of all the obligations of the Contractor under this contract, including liquidation of all progress payments hereunder, title to all property (or the proceeds thereof) which had not been delivered to, and accepted by the Government under this contract or which had not been incorporated in supplies delivered to and accepted by the Government under this contract and to which title has vested in the Government under this clause shall vest in the Contractor. The provisions of this contract referring to or defining liability for Government-furnished property shall not apply to property to which the Government shall have acquired title solely by virtue of the provisions of this clause.

(e) *Risk of Loss.* Except to the extent that the Government shall have otherwise expressly assumed the risk of loss of property, title to which vests in the Government pursuant to this clause, in the event of the loss, theft or destruction of or damage to any such property before its delivery to and acceptance by the Government, the Contractor shall bear the risk of loss and shall repay the Government an amount equal to the unliquidated progress payments based on costs allocable to such lost, stolen, destroyed or damaged property.

(f) *Control of Costs and Property.* The Contractor shall maintain an accounting system and controls adequate for the proper administration of this clause.

(g) *Reports—Access to Records.* Insofar as pertinent to the administration of this clause, the Contractor will (i) furnish promptly such relevant reports, certificates, financial statements, and other information as may be reasonably requested by the Contracting Officer, and (ii) give the Government reasonable opportunity to examine and verify his books, records and accounts.

(h) *Special Provisions Regarding Default.* If this contract is terminated pursuant to the clause entitled "Default," (i) the Contractor shall, upon demand, pay to the Government the amount of unliquidated progress payments and (ii) with respect to all property as to which the Government elects not to require delivery under the clause entitled "Default," title shall vest in the Contractor upon full liquidation of progress payments, and the Government shall be liable for no payment except as provided by the "Default" clause.

(i) *Reservations of Rights.* The rights and remedies of the Government provided in this clause shall not be exclusive, and are in addition to any other rights and remedies provided by law or under this contract. No payment, or vesting of title pursuant to this clause, shall excuse the Con-



tractor from performance of his obligations under this contract, nor constitute a waiver of any of the rights and remedies of the parties under this contract. No delay or failure of the Government in exercising any right, power or privilege under this clause shall affect any such right, power or privilege, nor shall any single or partial exercise thereof preclude or impair any further exercise thereof or the exercise of any other right, power or privilege of the Government.

(j) *Progress Payments to Subcontractors.* (1) The amount mentioned in item (a)(1)(ii) above shall be the sum of (i) all the progress payments made by the Contractor to his subcontractors and remaining unliquidated, and (ii) unpaid billings for progress payments to subcontractors which have been approved for current payment in the ordinary course of business, when under subcontracts which conform to (2) below.

(2) Subcontracts on which progress payments to subcontractors may be included in the base for progress payments pursuant to paragraph (a) of this clause are limited to those subcontracts in which there is expected to be a long "lead time," between the beginning of work and the first delivery, approximating four months or more for small business concerns and six months or more for firms which are not small business concerns, and in which the provisions regarding progress payments (i) are substantially similar to and as favorable to the Government as this "Progress Payments" clause, no more favorable to the subcontractor than this clause is to the Contractor and on a basis of not more than 85 percent of total costs (except that for those subcontractors that are not small business concerns a "Progress Payments" clause substantially similar to 7-104.35(a) will be used with a percentage of not more than 80 percent, and (ii) make all rights of the subcontractor with respect to all property to which the Government has title under the subcontract subordinate to the rights of the Government to require delivery of such property to it in the event of default by the Contractor under this contract or in the event of the bankruptcy or insolvency of the subcontractor.

(3) The Government agrees that any proceeds received by it from property to which it has acquired title by virtue of such provisions in any subcontract shall be applied to reduce the amount of unliquidated progress payments made by the Government to the Contractor under this contract. In the event the Contractor fully liquidates such progress payments made by the Government to him hereunder and there are progress payments to any subcontractors which are unliquidated, the Contractor shall be subrogated to all the Government's rights by virtue of such provisions in the subcontract or subcontracts involved as if all such rights had been thereupon assigned and transferred to the Contractor.

(4) The billings described in (j)(1)(ii) above shall be paid promptly by the Contractor in the ordinary course of business, not later than a reasonable time after payment of equivalent amounts by the Government to the Contractor.

(5) To facilitate small business participation in subcontracting under this contract, the Contractor agrees to offer and provide progress payments to those subcontractors which are small business concerns, in conformity with the standards for customary progress payments stated in paragraph 503 of Appendix E of the Armed Services Procurement Regulation, as in effect on the date of this contract. The Contractor further agrees that the need for such progress payments will not be considered as a handicap or adverse factor in the award of subcontracts.

(End of clause)

9. Paragraphs 7 and 8 of Standard Form 33A are deleted and the following substituted therefor:

LATE BIDS, MODIFICATIONS OF BIDS OR WITHDRAWAL OF BIDS (1973 JUL)

(a) Any bid received at the office designated in the solicitation after the exact time specified for receipt will not be considered unless it is received before award is made and either:

(i) it was sent by registered or certified mail not later than the fifth calendar day prior to the date specified for the receipt of bids (e.g., a bid submitted in response to a solicitation requiring receipt of bids by the 20th of the month must have been mailed by the 15th or earlier); or,

(ii) it was sent by mail (or telegram if authorized) and it is determined by the Government that the late receipt was due solely to mis-handling by the Government after receipt at the Government installation.

(b) Any modification or withdrawal of bid is subject to the same conditions as in (a) above. A bid may also be withdrawn in person by a bidder or his authorized representative, provided his identity is made known and he signs a receipt for the bid, but only if the withdrawal is made prior to the exact time set for receipt of bids.

(c) The only acceptable evidence to establish:

(i) the date of mailing of a late bid, modifications or withdrawal sent either by registered or certified mail is the U. S. Postal Service postmark on the wrapper or on the original receipt from the U. S. Postal Service. If neither postmark shows a legible date, the bid, modification or withdrawal shall be deemed to have been mailed late. "(The term 'postmark' means a printed, stamped, or otherwise placed impression that is readily identifiable without further action as having been supplied and affixed on the date of mailing by employees of the U. S. Postal Service.)"

(ii) the time of receipt at the Government installation is the time/date stamp of such installation on the bid wrapper or other documentary evidence of receipt maintained by the installation.

(d) Notwithstanding the above, a late modification of an otherwise successful bid which makes its terms more favorable to the Government will be considered at any time it is received and may be accepted.

10. Information Regarding Bidding Material, Bid Guarantee and Bonds. a. Bid Bonds. Each Bidder shall submit with his bid a Bid Bond (Standard Form 24) with good and sufficient surety or sureties acceptable to the Government, or other security as provided in paragraph 4 of Instructions to Bidders (Standard Form 22) in the form of twenty percent (20%) of the bid price or \$3,000,000 whichever is lesser. The bid bond penalty may be expressed in terms of a percentage of the bid price or may be expressed in dollars and cents.

b. Performance and Payment Bonds. Within 10 days after the prescribed forms are presented to the bidder to whom award is made for signature, a written contract on the form prescribed by the specifications shall be executed and two bonds each with good and sufficient surety or sureties acceptable to the Government, furnished; namely a Performance Bond (Standard Form 25) and a Payment Bond (Standard Form 25A). The penal sums of such bonds will be as follows:

(1) Performance Bond. The penal sum of the performance bond shall equal one hundred percent (100%) of the contract price.

(2) Payment Bond. (a) When the contract price is \$1,000,000 or less, the penal sum will be fifty percent (50% of the contract price.)

(b) When the contract price is in excess of \$1,000,000 but not more than \$5,000,000, the penal sum shall be forty percent (40%) of the contract price.

(c) When the contract price is more than \$5,000,000 the penal sum shall be \$2,500,000.  
Any bonds furnished will be furnished by the Contractor to the Government prior to commencement of contract performance. (ASPR 16-401.2)

11. Minimum Acceptance Period (1975 MAR) Offerors allowing less than the number of 45 calendar days in the 'Offer' portion of SF 33 for acceptance by the Government will be rejected as non-responsive.

12. Arithmetic Discrepancies.

(a) For the purpose of initial evaluation of bids, the following will be utilized in resolving arithmetic discrepancies found on the face of the bidding schedule as submitted by bidders:

- (1) Obviously misplaced decimal points will be corrected;
- (2) In case of discrepancy between unit price and extended price, the unit price will govern;
- (3) Apparent errors in extension of unit prices will be corrected; and
- (4) Apparent errors in addition of lump-sum and extended prices will be corrected.

(b) For the purposes of bid evaluation, the Government will proceed on the assumption that the bidder intends his bid to be evaluated on the basis of the unit prices, extensions, and totals arrived at by resolution of arithmetic discrepancies as provided above and the bid will be so reflected on the abstract of bids.

13. Funds Available for Payments.

a. Such work as may be done under this contract in excess of the amount for which funds are available for payment as herein set forth, will be continued with funds hereafter appropriated and allotted for this work.

b. From funds heretofore appropriated the following sums are available on the projects shown for payments to the Contractor for work performed under this contract during Fiscal Year 1976:

|                            |           |  |
|----------------------------|-----------|--|
| Brookville Lake, Indiana   | \$ 64,000 |  |
| Alum Creek, West Virginia  | 50,000    |  |
| East Lynn, West Virginia   | 110,000   |  |
| Youghiogheny, Pennsylvania | 2,000     |  |
| Caesar Creek Lake, Ohio    | 631,000   |  |
| East Fork Lake, Ohio       | 454,000   |  |
| Patoka Lake, Indiana       | 277,500   | Federal funds                                |
| Patoka Lake, Indiana       | 277,500   | Funds contributed by<br>the State of Indiana |

c. If at any time it becomes apparent to the Contracting Officer that the balance of this allocation is in excess of the amount required to meet all payments due and to become due because of work performed, the right is reserved after due notice to the Owner to reduce said allocation by the amount of such excess.

d. If the rate of progress of the work is such that it becomes apparent to the Contracting Officer that the balance of this allocation and any allocation for this and any subsequent fiscal years during the period of this contract is less than that required to meet all payments due and to become due the Owner because of work performed or to be performed under this contract, the Contracting Officer may provide additional funds for such payments if there be funds available for such purpose. The Owner will be notified in writing of any additional funds so made available. However, it is distinctly understood and agreed that the amount of funds stated in para b. is the maximum amount which it is certain will be available during the current fiscal year and the Government is in no case liable for payments to the Owner beyond this amount prior to having notified the Owner in writing of any additional funds that can be made available.

14. Warranty of Supplies.

a. Notwithstanding inspection and acceptance by the Government of supplies furnished under the contract or any provision of this contract concerning the conclusiveness thereof, the Contractor warrants that for one year after successful completion of tests and acceptance by the Government, all supplies furnished under this contract will be free from defects in design, material or workmanship and will conform with the specifications and all other requirements of this contract.

b. The Contracting Officer shall give written notice to the Contractor of any breach of the warranties in paragraph (a) of this clause within 30 calendar days after discovery of the defect or nonconformance to contract requirements.

c. Within a reasonable time after such notice, the Contracting Officer may either:

(i) by written notice require the prompt correction or replacement of any supplies or part thereof that do not conform with the requirements of this contract within the meaning of paragraph (a) of this clause; or the furnishing, delivering and installing of replacement parts for the defective items thereof; or

(ii) retain such supplies, whereupon the contract price thereof shall be reduced by an amount equitable under the circumstances and the Contractor shall promptly make appropriate repayment.

If the contract provides for inspection of supplies by sampling procedures, the Contracting Officer may, at his option, determine the quality of supplies or parts thereof which are subject to this paragraph in accordance with such sampling procedures.

d. When return, correction or replacement is required, the Contracting Officer shall return the supplies and transportation charges and responsibility for such supplies while in transit shall be borne by the Contractor. However, the Contractor's liability for such transportation charges shall not exceed an amount equal to the cost of transportation by the usual commercial method of shipment between the designated destination point under this contract and the Contractor's plant, and return.

e. If the Contractor fails or refuses to correct or replace the non-conforming supplies within a period of ten (10) days, or such longer period as the Contracting Officer may authorize in writing, after receipt of notice from the Contracting Officer specifying such failure or refusal, the Contracting Officer may, by contract or otherwise, correct or replace them with similar supplies and charge to the Contractor the cost occasioned to the Government thereby. In addition, if the Contractor fails to furnish timely disposition instructions, the Contracting Officer may dispose of the non-conforming supplies for the Contractor's account in a reasonable manner, in which case the Government is entitled to reimbursement from the Contractor or from the proceeds for the reasonable expenses of the care and disposition of the nonconforming supplies, as well as for excess costs incurred or to be incurred.

f. Any supplies or parts thereof corrected or furnished in replacement pursuant to this clause shall also be subject to all the provisions of this clause to the same extent as supplies initially delivered.

g. Failure to agree upon any determination to be made under this clause shall be a dispute concerning a question of fact within the meaning of the "Disputes" clause of this contract.

h. The word "supplies" as used herein includes related services.

i. The rights and remedies of the Government provided in this clause are in addition to and do not limit any rights afforded to the Government by any other clause of the contract.



Solicitation No. DACW27-75-B-0089

PART I - GENERAL INSTRUCTIONS

SECTION D - EVALUATION FACTORS FOR AWARD

1. Price Basis
2. Award

Solicitation No. DACW27-75-B-0089

PART I - SECTION D

1. Price Basis. Prices must be firm. Bids will not be considered which provide for subsequent increase in prices.
2. Award. After evaluation, award will be made to the lowest responsible and responsive bidder in the amount of the bid submitted.

## PART II - THE SCHEDULE

## SECTION E - Supplies/Services/Prices

| STANDARD FORM 36 JULY 1966<br>GENERAL SERVICES ADMINISTRATION<br>FED. PROC. REG. (41 CFR) 101-11.6   |                                       | CONTINUATION SHEET |        | REF. NO. OF DOC. BEING CONT'D<br>DACW27- 75 B 0089 |        | PAGE 1 OF 2 |  |
|--|---------------------------------------|--------------------|--------|--|--------|-------------|--|
| NAME OF OFFEROR OR CONTRACTOR  |                                       |                    |        |  |        |             |  |
| ITEM NO.   | SUPPLIES/SERVICES                     | QUANTITY           | UNIT   | UNIT PRICE   | AMOUNT |             |  |
| Industrialized Buildings, Sanitary Facilities in accordance with the Request for Technical Proposal dated 12 May 1975, your proposal approved under Step I and the Provisions of this SF 33 (Step II) Building prices will include fabrication and delivery. |                                       |                    |        |  |        |             |  |
| <u>BROOKVILLE LAKE, INDIANA</u>  |                                       |                    |        |  |        |             |  |
| Exterior Treatment - <u>TYPE A</u>   |                                       |                    |        |  |        |             |  |
| 1.   | Toilet Buildings, heated              | 2                  | Ea     |  |        |             |  |
| 2.   | Site preparation erection and testing | 1                  | Job    | for  |        |             |  |
| <u>ALUM CREEK, WEST VA</u>   |                                       |                    |        |  |        |             |  |
| Exterior Treatment - <u>TYPE A</u>   |                                       |                    |        |  |        |             |  |
| 3.   | Toilet Buildings unheated             | 8                  | Ea     |  |        |             |  |
| 4.   | Wash buildings heated                 | 2                  | Ea     |  |        |             |  |
| 5.   | Wash buildings unheated               | 2                  | Ea     |  |        |             |  |
| 6.   | Site Preparation erection and testing | 1                  | Job    | for  |        |             |  |
| 7.   | Access to Site (estimated)            | 7,500              | Ln.Ft. |  |        |             |  |
| <u>EAST LYNN WEST VA</u>   |                                       |                    |        |  |        |             |  |
| Exterior Treatment - <u>TYPE A</u>   |                                       |                    |        |  |        |             |  |
| 8.   | Toilet Buildings unheated             | 2                  | Ea     |  |        |             |  |
| 9.   | Wash Buildings unheated               | 2                  | Ea     |  |        |             |  |
| 10.  | Site preparation erection and testing | 1                  | Job    |  |        |             |  |
| 11.  | Access to Site (estimated)            | 500                | Ln.Ft. |  |        |             |  |
| <u>YOUGHIOGHENY, PA</u>  |                                       |                    |        |  |        |             |  |
| Exterior Treatment - <u>TYPE A</u>   |                                       |                    |        |  |        |             |  |
| 12.  | Toilet Building, heated               | 1                  | Ea     | for  |        |             |  |
| 13.  | Toilet Building, unheated             | 1                  | Ea     | for  |        |             |  |
| 14.  | Site preparation erection and testing | 1                  | Job    | for  |        |             |  |
| 15.  | Access to Site (estimated)            | 320                | Ln.Ft. |  |        |             |  |

## PART II - THE SCHEDULE

## SECTION E - Supplies/Services/Prices

| STANDARD FORM 36, JULY 1966<br>GENERAL SERVICES ADMINISTRATION<br>FED. PROC. REG. (41 CFR) 101-11.6 |                                       | CONTINUATION SHEET |        | REF. NO. OF DOC. BEING CONT'D<br>DACW27- 75 B -0089 |        | PAGE 2 OF 2 |  |
|---|---------------------------------------|--------------------|--------|---|--------|-------------|--|
| NAME OF OFFEROR OR CONTRACTOR   |                                       |                    |        |   |        |             |  |
| ITEM NO.  | SUPPLIES/SERVICES                     | QUANTITY           | UNIT   | UNIT PRICE  | AMOUNT |             |  |
| <u>CAESAR CREEK LAKE, OHIO</u>  |                                       |                    |        |   |        |             |  |
| Exterior Treatment - <u>TYPE A</u>  |                                       |                    |        |   |        |             |  |
| 16.   | Toilet buildings heated               | 13                 | Ea     |   |        |             |  |
| 17.   | Wash buildings, heated                | 7                  | Ea     |   |        |             |  |
| 18.   | Site preparation erection and testing | 1                  | Job    | for   |        |             |  |
| 19.   | Access to Site (estimated)            | 8150               | Ln.Ft. |   |        |             |  |
| <u>EAST FORK LAKE, OHIO</u>   |                                       |                    |        |   |        |             |  |
| Exterior Treatment - <u>TYPE A</u>  |                                       |                    |        |   |        |             |  |
| 20.   | Toilet buildings, heated              | 10                 | Ea     |   |        |             |  |
| 21.   | Wash buildings, heated                | 7                  | Ea     |   |        |             |  |
| 22.   | Site preparation erection and testing | 1                  | Job    | for   |        |             |  |
| 23.   | Access to Site (estimated)            | 8000               | LnFt.  |   |        |             |  |
| <u>PATOKA LAKE, INDIANA</u>   |                                       |                    |        |   |        |             |  |
| Exterior Treatment - <u>TYPE A</u>  |                                       |                    |        |   |        |             |  |
| 24.   | Toilet buildings unheated             | 13                 | Ea     |   |        |             |  |
| 25.   | Wash buildings unheated               | 8                  | Ea     |   |        |             |  |
| 26.   | Site preparation erection and testing | 1                  | Job    | for   |        |             |  |
| 27.   | Access to Site (estimated)            | 9700               | LnFt.  |   |        |             |  |
|   |                                       | TOTAL              |        |   |        |             |  |
| Location of Fabricating Plant: _____  |                                       |                    |        |   |        |             |  |
| _____   |                                       |                    |        |   |        |             |  |

PART II

SECTION F - Description/Specifications

1. The bidder will conform to the approved proposal submitted under Step 1 and with the performance specification dated 12 May 1975.
2. Changes in Specifications. The right is reserved as the interest of the Government may require, to revise or amend the Specifications, and/or drawings prior to the date set for opening bids. Such revisions and amendments if any, will be announced by amendment or amendments to this solicitation. Copies of such amendments as may be issued will be furnished to all prospective bidders. If the revisions and amendments are of a nature which require material changes in quantities or prices bid or both, the date set for opening bids may be postponed by such number of days as in the opinion of the Contracting Officer will enable the bidders to revise their bids. In such cases, the amendment will include an announcement of the new date for opening bids.
3. Special Provisions for Construction is contained in Part II- Section J therein.



PART II - THE SCHEDULE

SECTION G - PRESERVATION/PACKAGING/PACKING

1) Standard Commercial Packing consistent with the industry and the shipping mode used to assure receipt of the items in a first-class conditions at destination shall be used.

SECTION H - DELIVERY OR PERFORMANCE

1. Delivery: Delivery will be made with all delivery costs prepaid to the sites as specified in the attached schedule, Section H. All buildings shall be erected and completed by the dates as specified in the schedule, Section H.

2. Completion Time: Bids offering later completion dates than those specified in the schedule, Section H, will be rejected as non-responsive. The completion requirements herein are based on the assumption that the Notice to Proceed will be issued to the Contractor not later than ten (10) days after receipt of the required Performance & Payment Bonds and that acceptance by the Government of the toilet building at Brookville Lake will be within thirty (30) days after inspection and acceptance. Each delivery date set forth herein will be extended by the number of calendar days after the above dates that Notice to Proceed is in fact received and the Brookville installation is in fact accepted. You are directed to proceed with the performance of the work required by this contract immediately upon receipt by you of the Notice to Proceed letter.

3. Delivery at Brookville Lake. One (1) toilet building shall be fabricated, delivered, erected and tested at Brookville Lake on or before 22 December 1975, after receipt of Notice to Proceed. Fabrication and erection of all other buildings required under the contract will not commence until the Government has inspected and accepted the building erected at Brookville Lake.

SECTION I - INSPECTION AND ACCEPTANCE

1. Shop Inspection. The supplies being produced under this contract are subject to inspection at the Contractor's plant prior to shipment in accordance with Paragraph 5, General Provisions, (Supply Contract) dated 23 August 1971 (Revised 28 July 1975), unless waived in writing by the Contracting Officer. The Contractor shall notify the Contracting Officer in writing when the units have been completed and are ready for inspection by an authorized representative of the Contracting Officer.

2. The Contractor will notify the Government as to the location of the factory where the fabrication will take place.

3. Final inspection and acceptance will be made after erection at the site.

## SECTION H

Solicitation No. DACW27-75-B-0089

INDUSTRIALIZED BUILDING  
COMPLETION SCHEDULE

| Item | Date of Completion | Project      | Building | Item | Date of Completion | Project   | Building |
|------|--------------------|--------------|----------|------|--------------------|-----------|----------|
| 1    | - 22 Dec 75        | Brookville   | TF1      | 25   | - 13 Sep 76        | East Fork | TF1      |
| 2    | - 05 Apr 76        | Brookville   | TF2      | 26   | - 20 Sep 76        | East Fork | TF2      |
| 3    | - 12 Apr 76        | Caesar Creek | TF5      | 27   | - 27 Sep 76        | East Fork | TF6      |
| 4    | - 19 Apr 76        | Caesar Creek | TF7      | 28   | - 04 Oct 76        | East Fork | TF8      |
| 5    | - 26 Apr 76        | Caesar Creek | TF8      | 29   | - 11 Oct 76        | East Fork | TF9      |
| 6    | - 03 May 76        | Caesar Creek | TF9      | 30   | - 18 Oct 76        | East Fork | TF10     |
| 7    | - 10 May 76        | Caesar Creek | TF10     | 31   | - 25 Oct 76        | East Fork | WB1      |
| 8    | - 17 May 76        | Caesar Creek | TF6      | 32   | - 01 Nov 76        | East Fork | TF5      |
| 9    | - 24 May 76        | Caesar Creek | WB3      | 33   | - 08 Nov 76        | East Fork | TF4      |
| 10   | - 31 May 76        | Caesar Creek | TF1      | 34   | - 15 Nov 76        | East Fork | TF3      |
| 11   | - 07 Jun 76        | Caesar Creek | TF2      | 35   | - 22 Nov 76        | East Fork | TF7      |
| 12   | - 14 Jun 76        | Caesar Creek | TF3      | 36   | - 29 Nov 76        | East Fork | WB2      |
| 13   | - 21 Jun 76        | Caesar Creek | TF4      | 37   | - 06 Dec 76        | East Fork | WB3      |
| 14   | - 28 Jun 76        | Caesar Creek | TF11     | 38   | - 13 Dec 76        | East Fork | WB5      |
| 15   | - 05 Jul 76        | Caesar Creek | TF12     | 39   | - 20 Dec 76        | East Fork | WB6      |
| 16   | - 12 Jul 76        | Caesar Creek | TF13     | 40   | - 27 Dec 76        | East Fork | WB4      |
| 17   | - 19 Jul 76        | Caesar Creek | WB2      | 41   | - 03 Jan 77        | East Fork | WB7      |
| 18   | - 26 Jul 76        | Caesar Creek | WB5      | 42   | - 10 Jan 77        | East Lynn | TF1      |
| 19   | - 02 Aug 76        | Caesar Creek | WB4      | 43   | - 17 Jan 77        | East Lynn | TF2      |
| 20   | - 09 Aug 76        | Caesar Creek | WB1      | 44   | - 24 Jan 77        | East Lynn | WB1      |
| 21   | - 16 Aug 76        | Caesar Creek | WB6      | 45   | - 31 Jan 77        | East Lynn | WB2      |
| 22   | - 23 Aug 76        | Caesar Creek | WB7      | 46   | - 07 Feb 77        | Patoka    | TF6      |
| 23   | - 30 Aug 76        | Youghiogheny | TF1      | 47   | - 14 Feb 77        | Patoka    | TF7      |
| 24   | - 06 Sep 76        | Youghiogheny | TF2      | 48   | - 21 Feb 77        | Patoka    | TF11     |

Solicitation No. DACW27-75-B-0089  
Industrial Bldg. - Completion Schedule

| <u>Item</u> | <u>Date of<br/>Completion</u> | <u>Project</u> | <u>Building</u> | <u>Item</u> | <u>Completion</u> | <u>Project</u> | <u>Building</u> |
|-------------|-------------------------------|----------------|-----------------|-------------|-------------------|----------------|-----------------|
| 49          | 28 Feb 77                     | Patoka         | WB3             | 74          | 22 Aug 77         | Alum Creek     | TF8             |
| 50          | 7 Mar 77                      | Patoka         | WB4             | 75          | 29 Aug 77         | Alum Creek     | WB1             |
| 51          | 14 Mar 77                     | Patoka         | TF3             | 76          | 5 Sep 77          | Alum Creek     | WB2             |
| 52          | 21 Mar 77                     | Patoka         | TF4             | 77          | 12 Sep 77         | Alum Creek     | WB3             |
| 53          | 28 Mar 77                     | Patoka         | TF5             | 78          | 19 Sep 77         | Alum Creek     | WB4             |
| 54          | 4 Apr 77                      | Patoka         | TF12            |             |                   |                |                 |
| 55          | 11 Apr 77                     | Patoka         | WB6             |             |                   |                |                 |
| 56          | 18 Apr 77                     | Patoka         | TF13            |             |                   |                |                 |
| 57          | 25 Apr 77                     | Patoka         | WB5             |             |                   |                |                 |
| 58          | 2 May 77                      | Patoka         | TF8             |             |                   |                |                 |
| 59          | 9 May 77                      | Patoka         | TF9             |             |                   |                |                 |
| 60          | 16 May 77                     | Patoka         | TF10            |             |                   |                |                 |
| 61          | 23 May 77                     | Patoka         | TF1             |             |                   |                |                 |
| 62          | 30 May 77                     | Patoka         | TF2             |             |                   |                |                 |
| 63          | 6 Jun 77                      | Patoka         | WB2             |             |                   |                |                 |
| 64          | 13 Jun 77                     | Patoka         | WB1             |             |                   |                |                 |
| 65          | 20 Jun 77                     | Patoka         | WB7             |             |                   |                |                 |
| 66          | 27 Jun 77                     | Patoka         | WB8             |             |                   |                |                 |
| 67          | 4 Jul 77                      | Alum Creek     | TF1             |             |                   |                |                 |
| 68          | 11 Jul 77                     | Alum Creek     | TF2             |             |                   |                |                 |
| 69          | 18 Jul 77                     | Alum Creek     | TF3             |             |                   |                |                 |
| 70          | 25 Jul 77                     | Alum Creek     | TF4             |             |                   |                |                 |
| 71          | 1 Aug 77                      | Alum Creek     | TF5             |             |                   |                |                 |
| 72          | 8 Aug 77                      | Alum Creek     | TF6             |             |                   |                |                 |
| 73          | 15 Aug 77                     | Alum Creek     | TF7             |             |                   |                |                 |

SPECIAL PROVISIONS  
FOR  
CONSTRUCTION

SP-1. COMMENCEMENT, PROSECUTION AND COMPLETION OF WORK shall be in accordance with THE SCHEDULE, Section H - Standard Form 33 of the contract.

SP-2. LIQUIDATED DAMAGES. In case of failure on the part of the Contractor to complete the work within the time fixed in the contract or any extensions thereof, the Contractor shall pay to the Government as liquidated damages, pursuant to the clause of this contract entitled "Terminations for Default - Damages for Delay - Time Extensions," the sum of \$ 25.00 for each day of delay for each building.

SP-3. LOCATION DRAWINGS. Ten sets (5 half size and 5 full size) of location drawings will be furnished the Contractor without charge. Additional sets will be furnished on request at the cost of reproduction. The work shall generally be located as shown on the drawings listed herein, all of which form a part of the contract and are available in the Office of the Corps of Engineers, Department of the Army, Room 821, 600 Federal Place, Louisville, Kentucky. The Contractor shall furnish one set of reproducible drawings previously submitted under Step 1 and tentatively approved and the Government will furnish without charge to the Contractor 5 sets of prints.

TABLE OF DRAWINGS

| <u>Drawing No.</u>              | <u>Title</u>                                   | <u>Latest Rev.<br/>No. &amp; Date</u> |
|---------------------------------|--|---------------------------------------|
| 1BP 1.1/00                      | Project Location Plan & Index                  | None                                  |
| <u>BROOKVILLE LAKE, INDIANA</u> |  |                                       |
| IBP 1.1/0                       | Bon Well Hill<br>Toilet Facilities and Parking | None                                  |
| <u>CAESAR CREEK LAKE, OHIO</u>  |  |                                       |
| IBP 1.1/1                       | Wellman Meadows                                |                                       |
|                                 | Boat Ramp, Toilet Facilities and Parking       | None                                  |
| /2                              | Wellman Meadows                                |                                       |
|                                 | Picnic Area, Toilet Facilities and Parking     | None                                  |
| /3                              | Wellman Meadows                                |                                       |
|                                 | Picnic Area, Toilet Facilities and Parking     | None                                  |
| /4                              | Furnas Shores                                  |                                       |
|                                 | Boat Ramp, Toilet Facilities and Parking       | None                                  |
| /5                              | Mound Ridge                                    |                                       |
|                                 | Camping Areas, Wash Bldgs., Parking and Ramp   | None                                  |
| /6                              | Mound Ridge                                    |                                       |
|                                 | Camping Areas and Wash Buildings               | None                                  |

## TABLE OF DRAWINGS (CONT.)

| <u>Drawing No.</u>                    | <u>Title</u>   | <u>Latest Rev.<br/>No. &amp; Date</u> |
|---------------------------------------|--|---------------------------------------|
| <u>EAST FORK LAKE, OHIO</u>           |  |                                       |
| IBP 1.1/7                             | Dam Site Overlook Area   |                                       |
| /8                                    | Overlook and Toilet Facilities                                   | None                                  |
|                                       | Dam Site Tailwater Area  |                                       |
| /9                                    | Toilet Facilities and Parking                                    | None                                  |
|                                       | Tate Site  |                                       |
| /10                                   | Picnic Area, Toilet Facilities & Parking                         | None                                  |
|                                       | Tate Site  |                                       |
|                                       | Boat Ramp, Beach Area, Toilet Facilities<br>and Parking          | None                                  |
| /11                                   | Greenbriar Site  |                                       |
|                                       | Camping Areas and Wash Buildings                                 | None                                  |
| /12                                   | Greenbriar Site  |                                       |
|                                       | Camping Areas and Wash Buildings                                 | None                                  |
| /13                                   | Dam Site Overlook Area   |                                       |
|                                       | Overlook, Overlook Area, Shop and<br>Toilet Facility             | None                                  |
| /14                                   | Dam Site Tailwater Area  |                                       |
|                                       | Toilet Facility and Parking                                      | None                                  |
| /15                                   | Dam Site Tailwater Area  |                                       |
|                                       | Picnic Area, Toilet Facility & Parking                           | None                                  |
| /16                                   | Newton Stewart   |                                       |
|                                       | Boat Ramp, Toilet Facilities & Parking                           | None                                  |
| /17                                   | Newton Stewart   |                                       |
|                                       | Camping Area, Beach Area, Toilet<br>Facilities and Wash Building | None                                  |
| /18                                   | Newton Stewart   |                                       |
|                                       | Camping Area, Wash Buildings, Toilet<br>Facilities and Parking   | None                                  |
| /19                                   | Overlook Point and<br>East Fork Camping Area                     | None                                  |
| <u>YOUGHIOGHENY RIVER LAKE, PENN.</u> |  |                                       |
| IBP 1.1/20                            | Youghiogheny Recreation Area                                     | None                                  |

SP-4. PHYSICAL DATA. Information and data furnished or referred to below are furnished for the Contractor's information. However, it is expressly understood that the Government will not be responsible for any interpretation or conclusion drawn therefrom by the Contractor.



AD-A038 594

CONSTRUCTION ENGINEERING RESEARCH LAB (ARMY) CHAMPAI--ETC F/G 13/2  
A SYSTEMS APPROACH TO CONSTRUCTION OF RECREATIONAL AREA FACILIT--ETC(U)  
MAR 77 E J WORREL

UNCLASSIFIED

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2 OF 2  
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SP-4.1 The physical conditions indicated on the drawings are the result of site investigations by surveys.

SP-4.2 Weather Conditions. The Contractor shall make his own investigations as to weather conditions at the site.

SP-4.3 Transportation Facilities. The Contractor shall make his own investigations as to transportation facilities at the site.

SP-5. LAYOUT OF WORK (1965 APR OCE). The Contractor shall lay out his work from Government-established base lines and bench marks indicated on the drawings and shall be responsible for all measurements in connection therewith. The Contractor shall furnish, at his own expense, all stakes, templates, platforms, equipment, tools, and materials and labor as may be required in laying out any part of the work from the base lines and bench marks established by the Government. The Contractor will be held responsible for the execution of the work to such lines and grades as may be established or indicated by the Contracting Officer. It shall be the responsibility of the Contractor to maintain and preserve all stakes and other marks established by the Contracting Officer until authorized to remove them. If such marks are destroyed, by the Contractor or through his negligence, prior to their authorized removal, they may be replaced by the Contracting Officer at his discretion. The expense of replacement will be deducted from any amounts due or to become due the Contractor.

SP-6. CERTIFICATES OF COMPLIANCE (1969 MAY OCE). Any certificates required for demonstrating proof of compliance of materials with specification requirements shall be executed in two copies. Each certificate shall be signed by an official authorized to certify in behalf of the manufacturing company and shall contain the name and address of the Contractor, the project name and location, and the quantity and date or dates of shipment or delivery to which the certificates apply. Copies of laboratory test reports submitted with certificates shall contain the name and address of the testing laboratory and the date or dates of the tests to which the report applies. Certification shall not be construed as relieving the Contractor from furnishing satisfactory material, if after tests are performed on selected samples, the material is found not to meet the specific requirements.

SP-7. ACCIDENT PREVENTION. EM 385-1-1, 1 March 1967, referred to in "Accident Prevention" article of General Provisions, including Change 1, 27 March 1972, is hereby supplemented or revised as follows:

SP-7.1 Trailers. Where trailers are used as field offices or to house personnel, the trailer shall be anchored after spotting and blocking up by installation of four 8-way expanding anchors with rods and cable, one under each of the four corners of the trailer. The anchors

shall be not less than 3 feet under the surface of the ground with anchor rod extending to the ground surface. The trailer shall be securely anchored down by installation at each anchor of a 1/2-inch cable attached to the longitudinal frame member of the trailer by passing the cable over the frame member or to an eyebolt fastened to the frame, and then tightened by use of a turnbuckle or other approved means as necessary to prevent movement. Details of proposed method of anchoring shall be submitted for approval.

SP-7.2 Safety Check Valves and Connections on Oxyacetylene Torches.

SP-7.2.1 A "Safety Check Valve" shall be installed on the torch of all oxyacetylene torches to prevent the explosive mixtures of oxygen and fuel gas caused by the accidental backflow of gases. Due to the difference in pressures of the two gases, the higher pressure could cause the other gas to reverse its flow resulting in a combination of gases in one chamber, hose, regulator, or cylinder. Flashbacks and backfires result from this combination of gases. Possible personal injury and damage to the equipment may occur.

SP-7.2.2 Only fittings approved by the American Welding Society shall be used for connections and hose splices. The use of a short piece of pipe or tubing secured with clamps or wire will not be permitted.

SP-7.3 Paragraph 01.A. Regularly scheduled meetings of all Contractor and subcontractor supervisors shall be held on a monthly basis. The purpose of the meetings shall be: (a) to study and familiarize supervisors with applicable portions of these General Safety Requirements; (b) planning to control hazards; and (c) recognition and discussion of safety deficiencies and/or unsafe conditions and procedures for correction.

SP-7.4 Paragraph 15.D.

SP-7.4.1 All 15 and 20 ampere single phase receptacle outlets utilized by the Contractor shall be 3-wire grounded type, shall have approved "ground fault circuit protection" in accordance with Article 210-8 of the National Electrical Code, and shall be installed in the following locations as a minimum:

- (1) Maintenance and fabrication shops
- (2) Laboratory facilities
- (3) Office trailers, temporary office buildings, warehouse and storage facilities with outside receptacles. (Outside receptacle circuit only need be equipped.)
- (4) Portable power sources (M-G sets, light plants, and electrical welders with receptacle outlets)

(5) All temporary and permanent 15 and 20 ampere receptacle circuits supplying power for portable or semi-portable tools or equipment.

SP-7.4.2 The maximum allowable circuit protection for conventional type receptacles is 20 amperes.

SP-7.4.3 Resistance to ground for the 3-wire system or portable power plants shall not exceed 25 ohms.

SP-7.5 Paragraphs 18.A.19 and 18.A.20. Canopies, guards, shields, and grilles, for the protection of operators from falling and flying objects or from the hazards of rollover, shall be installed before the equipment on which it is required is used on the work at the job site. Rollover protection systems will not be accepted until seat belts have been installed on the equipment involved.

SP-7.6 Paragraph 18.C.14 (Change 1) is changed to read: "Cranes and derricks over 10 tons rated capacity, except clamshells and similar shovel cranes, shall be equipped with a boom angle indicator."

SP-8. REQUIRED INSURANCE (APR 1968).

SP-8.1 The Contractor shall procure and maintain during the entire period of his performance under this contract the following minimum insurance:

(1) Coverage complying with State laws governing insurance requirements, such as those requirements pertaining to Workman's Compensation and Employer's Liability Insurance.

(2) Comprehensive General Liability and Automobile Liability Insurance, in each instance for both bodily injury and property damage, shall be furnished in limits of not less than \$50,000.00 per person, \$100,000.00 per accident for bodily injury and \$5,000.00 per accident for property damage. When the Financial Responsibility or Compulsory Insurance Law of the State, wherein the contract is to be performed, requires higher limits, the policy shall provide for coverage of at least those limits.

SP-8.2 Prior to the commencement of work hereunder, the Contractor shall furnish to the Contracting Officer a certificate or written statement of the above-required insurance. The policies evidencing required insurance shall contain an indorsement to the effect that cancellation or any material change in the policies adversely affecting the interests of the Government in such insurance shall not be effective until 10 days after written notice thereof to the Contracting Officer.

SP-8.3 The Contractor agrees to insert the substance of this clause, including SP-8.2 in all subcontracts hereunder.



SP-9. TIME EXTENSIONS. Notwithstanding any other provisions of this contract it is mutually understood that the time extensions for changes in the work will depend upon the extent, if any, by which the changes cause delay in the completion of the various elements of construction. The change order granting the time extension may provide that the contract completion date will be extended only for those specific elements so delayed and that the remaining contract completion dates for all other portions of the work will not be altered and may further provide for an equitable readjustment of liquidated damages pursuant to the new completion schedule.

SP-10. DAMAGE TO WORK (1966 MAR OCE). The responsibility for damage to any part of the permanent work shall be as set forth in the clause of the contract entitled "Permits and Responsibilities." However, if in the judgement of the Contracting Officer, any part of the permanent work performed by the Contractor is damaged by flood or earthquake, which damage is not due to the failure of the Contractor to take reasonable precautions or to exercise sound engineering and construction practices in the conduct of the work, the Contractor will make the repairs as ordered by the Contracting Officer and full compensation for such repairs will be made at the applicable contract unit or lump sum prices as fixed and established in the contract. If, in the opinion of the Contracting Officer, there are no contract unit or lump sum prices applicable to any part of such work, an equitable adjustment pursuant to Clause 3 - Changes, of the contract, will be made as full compensation for the repairs of that part of the permanent work for which there are no applicable contract unit or lump sum prices. Except as herein provided, damage to all work (including temporary construction), utilities, materials, equipment and plant shall be repaired to the satisfaction of the Contracting Officer at the Contractor's expense, regardless of the cause of such damage.

SP-11. WORK IN QUARANTINED AREA (1968 MAY OCE). The work called for by this contract involves activities in counties quarantined by the Department of Agriculture to prevent the spread of certain plant pests which may be present in the soil. The Contractor agrees that all construction equipment and tools to be moved from such counties shall be thoroughly cleaned of all soil residues at the construction site with water under pressure and that hand tools shall be thoroughly cleaned by brushing or other means to remove all soil. In addition, if this contract involves the identification, shipping, storage, testing, or disposal of soils from such a quarantined area, the Contractor agrees to comply with the provisions of ER 1110-1-5 and attachments, a copy of which will be made available by the Contracting Officer upon request. The Contractor agrees to assure compliance with this obligation by all subcontractors. (This paragraph applies to all counties involved in Ohio, West Virginia, Pennsylvania, and Indiana, except Franklin County, Indiana.)



SP-12. LOCAL LABOR PREFERENCE.

SP-12.1 The Contractor and his subcontractors shall, in carrying out the work under this contract, give preference to qualified persons who regularly reside in the area where the project is situated except:

- (1) To the extent that qualified persons regularly residing in the area are not available.
- (2) For the reasonable needs of the Contractor or his subcontractor to employ supervisory or specially experienced individuals necessary to assure execution of the contract.
- (3) For the obligation of the Contractor or his subcontractors to offer employment to present or former employees as the result of a lawful collective bargaining contract, provided that in no event shall the number of non-resident persons employed under this subparagraph (3) exceed 20 percent of the total number of employees employed by such Contractor and his subcontractors on such project.

SP-12.2 The Contractor and his subcontractors shall furnish the United States Employment Service Office in the area in which the project is located with a list of all positions for which they may from time to time require laborers, mechanics and other employees.

SP-12.3 The Contractor shall furnish and shall be responsible for his subcontractors furnishing to the Contracting Officer calendar year quarterly reports by the 10th of the month following the end of each calendar quarter year. Reports shall be in such form as the Contracting Officer may prescribe and shall show the total number of employees and the number of employees who regularly reside within commuting distance of the site of the work. If the number of non-resident employees of the Contractor or any subcontractor exceeds 20% of his total employees, the report shall also include a statement of actions taken to achieve compliance with this clause.

(The above paragraph applies to Clermont County, Ohio.)

SP-13. PROJECT SIGN.

SP-13.1 General. The Contractor shall furnish and erect one sign at Brookville Lake, Indiana. - This project sign shall

be lettered on one side only and shall conform to the details and colors shown on the sketch bound with these "Special Provisions" for single-face sign. Name of the project shall be as follows:

INDUSTRIALIZED  
SANITARY FACILITIES

SP-13.2 Materials. The sign shall be constructed of good sound materials suitable for the purpose. Lumber shall be of softwood of No. 2 or Standard grade. Sizes shown are nominal. Plywood shall be B-B, exterior grade. Screws shall be of commercial quality and of sizes shown.

SP-13.3 Painting. The sign and posts shall be given one prime coat and two finish coats of exterior oil paint before lettering. Letters and trim shall be applied to one side only using one coat of enamel of color, style and size shown. Paint shall be of good commercial quality suitable for exterior use.

SP-13.4 Castle Decal will be furnished to the Contractor upon request and shall be applied at the location shown.

SP-13.5 Erection and Maintenance. The sign shall be erected at the designated location. Sign shall be plumb and backfill of post holes shall be well tamped to properly support the sign in position throughout the life of the contract. The sign shall be maintained in good condition until completion of the contract, shall remain the property of the Contractor and shall be removed from the site upon completion of work under the contract.

SP-13.6 Payment. No separate payment will be made for furnishing and erecting the project sign as specified and costs thereof shall be considered a subsidiary obligation of the Contractor.

SP-14. CONTRACTOR QUALITY CONTROL. The Contractor shall provide and maintain an effective quality control program that complies with General Provision 32 of the contract entitled "Contractor Inspection System."

SP-14.1 The Contractor shall establish a quality control system to perform sufficient inspection and tests of all items of work, including that of his subcontractors, to insure conformance to applicable specifications and drawings with respect to the materials, workmanship, construction, finish, functional performance, and identification. This control will be established for all construction except where the Technical Provisions of the contract provide for specific Government control by inspections, tests or other means. The Contractor's control system will specifically include surveillance and tests required in the Technical Provisions of the contract specifications.

SP-14.2 The Contractor's quality control system is the means by which he assures himself that his construction complies with the requirements of the contract plans and specifications. The controls shall be adequate to cover all construction operations and should be keyed to the proposed construction sequence.

SP-14.3 The Contractor's job supervisory staff may be used for quality control, supplemented as necessary by additional personnel for surveillance, special technicians, or testing facilities to provide capability for the controls required by the Technical Provisions of the specifications.

SP-14.4 The Contractor shall furnish to the Government within 10 days after receipt of the Notice to Proceed a quality control plan which shall include the procedures, instructions and reports to be used. This document will include as a minimum:

- (1) The quality control organization.
- (2) Number and qualifications of personnel to be used for this purpose.
- (3) Authority and responsibilities of quality control personnel.
- (4) Methods of quality control including that for his subcontractor's work.
- (5) Test methods including name of qualified testing laboratory to be used.
- (6) Method of documenting quality control operation, inspection, and testing.
- (7) A copy of a letter of direction to the Contractor's representative responsible for quality control, outlining his duties and responsibilities, and signed by a responsible officer of the firm.

SP-14.5 After the contract is awarded and before construction operations are started, the Contractor shall meet with the Contracting Officer, or his representative, and discuss quality control requirements. The meeting shall develop mutual understanding relative to details of the system, including the forms to be used for recording the quality control operations, inspections, administration of the system, and the inter-relationship of the Contractor and Government inspection.

SP-14.6 Unless specifically authorized by the Contracting Officer, no construction will be started until the Contractor's quality control plan is accepted.

SP-14.7 All compliance inspections will be recorded on an approved form, including but not limited to, the specific items required in each technical section of the specifications. This form, to include records of corrective action taken, will be furnished daily to the Government as required by the Contracting Officer. A typical Contractor Quality Control report form is attached to these Special Provisions.

SP-14.8 If recurring deficiencies in an item or items indicate that the quality control system is not adequate, such corrective actions will be taken as directed by the Contracting Officer.

SP-15. INTERFERENCE WITH TRAFFIC AND PUBLIC AND PRIVATE PROPERTY.

SP-15.1 The Contractor at all times shall dispose his plant and conduct the work in such manner as to cause as little interference as possible with private and public travel. Damage (other than that resulting from normal wear and tear) to roads, shall be repaired to as good a condition as they were prior to the beginning of work and to the satisfaction of the Contracting Officer. The existing access road and parking area at Brookville Lake will remain open to the public for use and adequate space shall be provided for parking; however, use during the period of 1 November to 1 May is usually light.

SP-15.2 The Contractor shall provide and maintain proper barricades, fences, danger signals and lights, provide a sufficient number of watchmen, and take such other precautions as may be necessary to protect life, property and structures, and shall be liable for and hold the Government free and harmless from all damages occasioned in any way by his act or neglect, or that of his agents, employees, or workmen. Where interference will be with traffic on State or County roads, the requirements of the appropriate State or County Department of Highways or Roads shall be complied with.

SP-16. OTHER CONTRACTS. The Government will award contracts for relocation of highways, for construction of access roads to certain sites as needed, for site grading and paving, and for construction of utilities beyond a line approximately 5 feet from each building at the various sites, and work thereunder may, or may not, be concurrent with work under this contract. At Brookville Lake there will be two Contractors working in the Bon Well Hill area. The Contractor shall cooperate fully with other Contractors engaged in work at the sites.

SP-17. EQUIPMENT OWNERSHIP AND OPERATING EXPENSE SCHEDULE. Allowable ownership and operating expense cost for construction plant and equipment in sound workable condition, owned and furnished by the Contractor or a subcontractor for work requiring adjustments in contract price, shall be based upon the applicable provisions of "Louisville Engineer District Equipment Ownership and Operating Expense Schedule."



These methods of rate determination for construction plant and equipment cost shall apply to all adjustments of contract price arising under the clauses of the General Provisions, Special Provisions, and Technical Provisions of the contract except the General Provision Clause entitled, "Termination for Convenience of the Government." The LED Equipment Ownership and Operating Expense Schedule (ORLP 1180-1-5) will be updated annually as provided for in the Schedule.

SP-18. EQUIPMENT REPORT.

SP-18.1 The Contractor shall submit a daily listing of all Contractor-owned or rented equipment at the job site. A similar listing will be required for all subcontractor's equipment. The listing for subcontractors may be separate or included with the Contractor's listing provided the equipment is adequately identified as to ownership. The required equipment list shall include each item of equipment (hand-operated tools or equipment excluded) on the job and shall specifically identify each item as to whether it is Contractor-owned or rented, shifts, hours of usage, down time for repairs, and standby time. Identification of the equipment shall include make, model, and plant number of all items. Separate identification by a key sheet providing these data may be utilized with the daily listing indicating the type of equipment and the equipment plant numbers. The format of the daily report will be approved by the Contracting Officer in the field.

SP-18.2 A supplemental report shall be submitted daily listing equipment used or made idle by any Change Order work directed by the Government and for which agreement has not been reached on a price adjustment. This requirement includes work which has not been directed in writing but which, under GENERAL PROVISION Clause 3(b), is considered by the Contractor to be a Change Order. (Submittal of such an equipment report will not be construed as providing the notice required under said Clause 3(b).) The supplemental report shall identify the particular change involved in a manner acceptable to the Contracting Officer in the field.

SP-19. INDIANA SALES AND USE TAX (1971 JAN).

SP-19.1 This contract is a construction contract which contains separate amounts applicable to the performance of the services and the furnishing of the materials as defined in State of Indiana, Department of Revenue Circular ST-21 (Revised) dated 1 July 1969. Notwithstanding any other provisions of this contract, the contract price does not include any amount for Indiana Sales and Use Tax on materials to be incorporated by the Contractor or any subcontractor into the structure or improvement to real estate. The Contractor or any subcontractor should provide his supplier with a State of Indiana General Exemption Certificate (Form ST-105) with respect to such property.



SP-19.2 For the purpose of complying with the requirements of State of Indiana, Department of Revenue Circular ST-21 (Revised) dated 1 July 1969, the Contractor, pursuant to the requirements of the solicitation has furnished prior to contract award a breakdown separately pricing (1) materials to be incorporated into the structure or improvement to real estate; (2) services and other obligations of the construction contract; and (3) total contract price. This breakdown is for the sole purpose of complying with the requirements of State of Indiana, Department of Revenue Circular ST-21 (Revised) dated 1 July 1969 with regard to separate pricing of services and materials and has no other contractual significance.

SP-19.3 Any subcontracts awarded hereunder shall also contain separate amounts applicable to the performance of services and the furnishing of materials.

(The above paragraph applies to site work at Brookville and Patoka Lakes in Indiana.)

SP-20. CHANGE IN BUILDING LOCATION OR FOUNDATION. Except at Brookville Lake, Indiana, the building locations shown on the drawings for the various sites are approximate only and are subject to change within 600 feet, depending upon utility and other studies not yet completed. The Contractor shall allow 10 cubic yards of common excavation for site grading, except at Brookville Lake, and in the event the actual quantity is more or less as determined by cross sections taken by the Contractor before and after grading, and verified by the Contracting Officer, the contract price for site work and erection will be adjusted upward or downward based on unit prices listed below. In a similar manner, if rock as defined hereinafter is encountered, including Brookville Lake, the Government reserves the right to modify foundations in order that each building will be founded solely on sound rock or solely on earth, and not partly on rock and partly on earth. In the event peat or other highly organic matter is encountered, the Government also reserves the right to extend foundations to suitable depth. The following unit prices will be used for adjustment of the contract price for site work and erection:

| <u>Description</u>               | <u>Unit</u> | <u>Unit Price</u> |
|----------------------------------|-------------|-------------------|
| Common Excavation, Site          | C.Y.        | \$ 3.00           |
| Rock Excavation, Site            | C.Y.        | 15.00             |
| Common Excavation,<br>Foundation | C.Y.        | 6.00              |
| Rock Excavation,<br>Foundation   | C.Y.        | 65.00             |
| Caisson Excavation               | C.Y.        | 15.00             |
| Concrete w/o Forms               | C.Y.        | 100.00            |
| Concrete w/Forms                 | C.Y.        | 200.00            |

## DEFINITIONS:

Rock Excavation is excavation that must be drilled and blasted for removal; all other will be classified as Common Excavation.

Site Excavation is all excavation above an elevation 6 inches below the floor elevation, including that within the building lines.

Foundation Excavation is all excavation below an elevation 6 inches below the floor elevation except for caissons.

Caisson Excavations are drilled, augered, or hand-dug holes between bottom of plan foundation and sound rock.

Concrete is for foundations including caissons.

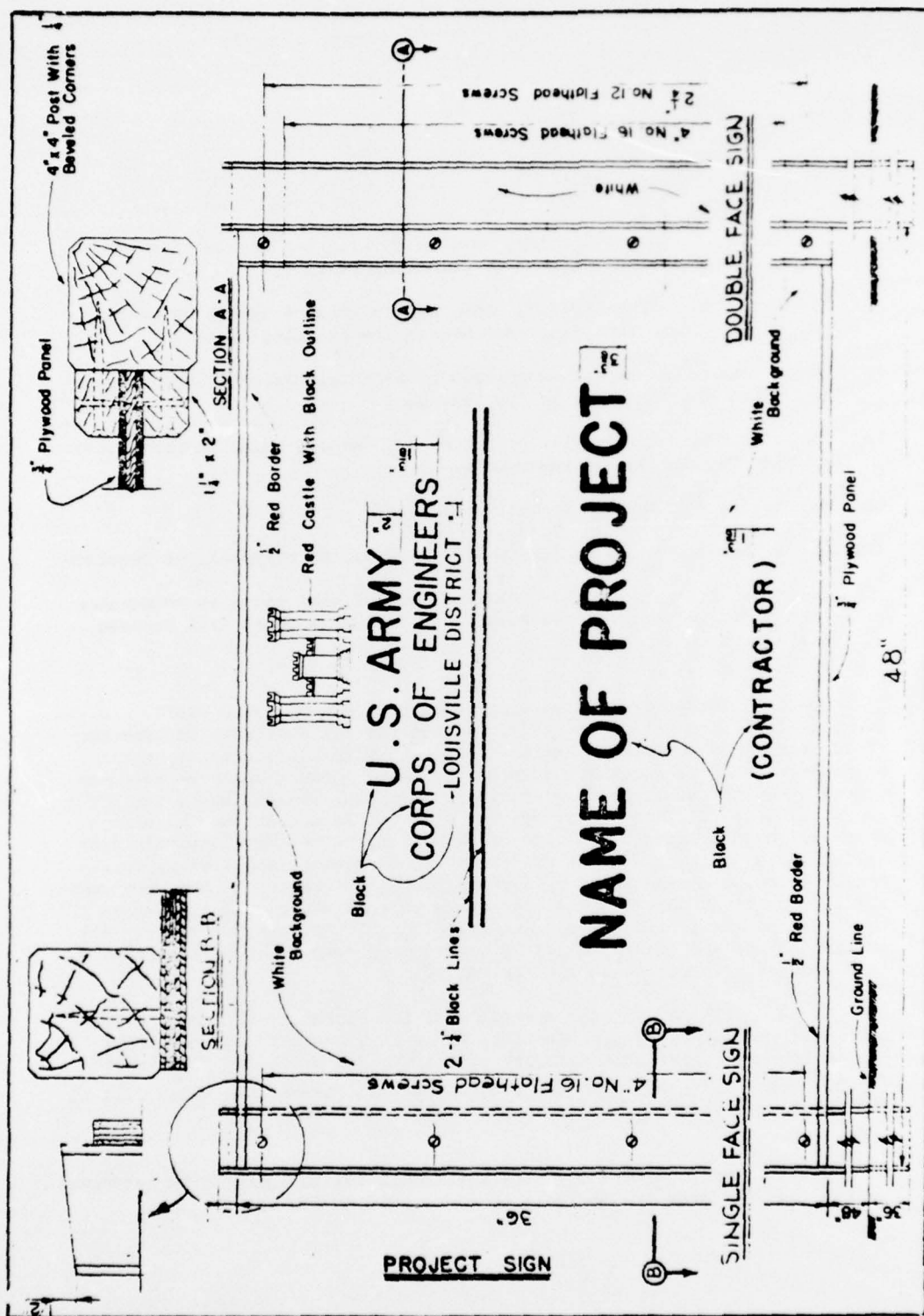
All prices for excavation include backfill, fill, or disposal, as required.

All prices for concrete include reinforcement of same ratio as foundation plans. If different, an allowance of \$0.50 per pound will be used for adjustment.

SP-21. CONTRACTOR-FURNISHED EQUIPMENT FOR MAKING FIELD TESTS. In the event utilities to be constructed by others are not available in time for field tests, the Contractor shall furnish all water, electricity, tanks, pumps and drains as necessary to make the tests. Power shall be adequate to test the largest piece of electrical equipment. Sufficient water shall be provided to fill the entire system, plus not less than such quantity that will permit three operations of each flush valve and a 3-minute flow at full open position at each valved outlet. Pressure shall be approximately 40 psi and maintained by a pneumatic tank or equal. Temporary piping shall be provided for each building drain to a suitable outlet, sump or tank. Sumps shall be dewatered and filled upon completion of tests. All permanent pipe and conduit shall be capped upon completion of tests and left ready for future connection by others.

SP-22. WAGE RATES. The decisions of the Secretary of Labor, covering wages, including fringe benefits, to be paid laborers and mechanics performing work under this contract at the various sites are attached to these SPECIAL PROVISIONS for all projects except Patoka Lake which will be furnished by amendment.

SP-23. ENVIRONMENT PROTECTION applicable for the work to be performed at the various sites are attached to these SPECIAL PROVISIONS.



(Sample of Typical Contractor Quality Control Report)

CONTRACTOR'S NAME  
(Address)

( Daily )  
(Biweekly) CONSTRUCTION QUALITY CONTROL REPORT  
( Weekly)

Date: \_\_\_\_\_ Report No. \_\_\_\_\_

Contract No.: \_\_\_\_\_

Description and Location of Work: \_\_\_\_\_

WEATHER: (Clear) (P. Cloudy) (Cloudy); Temperature: \_\_\_ Min, \_\_\_ Max; Rainfall \_\_\_ in

Contractor/Subcontractors and Area of Responsibility

- a. \_\_\_\_\_
- b. \_\_\_\_\_
- c. \_\_\_\_\_
- d. \_\_\_\_\_
- e. \_\_\_\_\_
- f. \_\_\_\_\_
- g. \_\_\_\_\_

1. Work Performed Today: (Indicate location and description of work performed. Refer to work performed by prime and/or subcontractors by letter in table above).
2. Results of Surveillance: (Include satisfactory work completed, or deficiencies with action to be taken).
3. Tests Required by Plans and/or Specifications Performed and Results of Tests:



4. Verbal Instructions Received: (List any instructions given by Government personnel on construction deficiencies, retesting required, etc., with action to be taken).

5. Remarks: (Cover any conflicts in plans, specifications, or instructions).

Inspector

CONTRACTOR'S VERIFICATION: The above report is complete and correct and all material and equipment used and work performed during this reporting period are in compliance with the contract plans and specifications except as noted above.

Contractor's Approved Authorized Representative



ENVIRONMENT PROTECTION  
FOR  
CONSTRUCTION

EP-1. GENERAL. For the purpose of this specification, environment protection is defined as the retention of the environment in its natural state to the greatest possible extent during project construction and to enhance the natural appearance in its final condition. Environment protection requires consideration of air, water, and land, and involves noise, solid waste-management and management of radiant energy and radioactive materials, as well as other pollutants. In order to prevent, and to provide for abatement and control of, any environmental pollution arising from the construction activities in the performance of this contract, the Contractor and his subcontractors shall comply with all applicable Federal, State, and local laws and regulations concerning environmental pollution control and abatement.

EP-2. NOTIFICATION. The Contracting Officer will notify the Contractor in writing of any non-compliance with the aforementioned Federal, State or local laws or regulations. Such notice, when delivered to the Contractor or his authorized representative at the site of the work, shall be deemed sufficient for the purpose. The Contractor shall, after receipt of such notice, immediately inform the Contracting Officer of proposed corrective action and take such action as may be approved. If the Contractor fails or refuses to comply promptly, the Contracting Officer may issue an order stopping all or part of the work until satisfactory corrective action has been taken. No part of the time lost due to any such stop orders shall be made the subject of a claim for extension of time or for excess costs or damages by the Contractor.

EP-3. SUBCONTRACTORS. Compliance with the provisions herein by subcontractors will be the responsibility of the Contractor.

EP-4. IMPLEMENTATION. Prior to commencement of the work the Contractor will:

(1) submit in writing his proposals for implementing requirements herein for environment protection;

(2) meet with representatives of the Contracting Officer to develop understanding relative to compliance with this provision and administration of the environment protection program. Approval of the Contractor's plan for environment protection will not relieve the Contractor of his responsibility for adequate and continuing control of pollutants.

EP-5. PROTECTION OF LAND RESOURCES.

EP-5.1 General. The land resources within the project boundaries and outside the limits of permanent work performed under this contract shall be preserved in their present condition or be restored to a condition

after completion of the construction that will appear to be natural and not detract from the appearance of the project. The Contractor shall confine his construction activities to areas defined by the plans or specifications. The following additional requirements are intended to supplement the requirements of General Provisions 42, 43 and 47.

**EP-5.2 Prevention of Landscape Defacement.** Except in areas indicated on the plans where permanent work under this contract or future contracts is to be performed, and except as required for access to these areas, the Contractor shall not deface, injure, or destroy trees or shrubs, nor remove or cut them without the authority of the Contracting Officer. Ropes, cables, or guys shall not be fastened to or attached to any existing nearby trees for anchorages unless specifically authorized. Where such special emergency use is permitted, it shall be performed in such a manner as to avoid damage to the trees. The Contractor shall in any event be responsible for any damage resulting from such use. Where the possibility exists that trees may be defaced, bruised, injured, or otherwise damaged by the Contractor's equipment or operations, the Contractor shall adequately protect such trees. Stone, earth or other material that is displaced into uncleared areas shall be removed. Monuments and markers shall be protected before construction operations commence. A pre-construction survey including photographs shall be accomplished by the Contractor and a report of survey furnished when required by the Contracting Officer.

**EP-5.3 Restoration of Landscape Damage.** Any trees or other landscape feature located outside of approved work limits, and scarred or damaged by the Contractor's equipment or operations, shall be restored to a condition satisfactory to the Contracting Officer. Restoration of scarred or damaged trees shall be performed in an approved manner by experienced workmen. Trees damaged beyond restoration shall be removed and disposed by the Contractor. Trees that are to be removed because of damage shall be replaced at the Contractor's expense by nursery-grown trees of the same species or a species approved by the Contracting Officer. The size and quality of nursery-grown trees shall also be approved by the Contracting Officer.

**EP-5.4 Location of Storage Facilities.** Contractor's storage, and other construction buildings, located on Government property, which is required in the performance of the work, shall be located upon open field portions of the job site or areas to be cleared under future contracts, and shall require written approval of the Contracting Officer. The preservation of the landscape shall be an imperative consideration in the selection of all sites and in the construction of buildings. Plans showing storage facilities shall be submitted for approval of the Contracting Officer. Where buildings or structures are constructed on sidehills, the Contracting Officer may require cribbing to be used to obtain level foundations. Benching or leveling of earth may be permitted, depending on the location of the proposed facility.

**EP-5.5 Temporary Excavation and Embankments.** If the Contractor proposes to construct temporary roads or embankments and excavations for plant and/or work areas, he shall submit the following for approval prior to scheduled start of such temporary work:

(1) A layout of all temporary roads, excavations and embankments to be constructed within the work area.

(2) A landscaping plan showing the proposed restoration of the area. The plan shall provide for the obliteration of construction scars as such and shall provide for a reasonably natural appearing final condition of the area. No unauthorized road construction, excavation or embankment construction (including borrow and disposal areas) will be permitted.

EP-5.6 Post-Construction Cleanup or Obliteration. The Contractor shall obliterate all signs of temporary construction facilities such as haul roads, work areas or any other vestiges of temporary construction outside the limits of permanent work under this contract or future contracts as directed by the Contracting Officer. The area will be restored to near natural conditions which will permit the growth of vegetation thereon. Restoration to original contours will not be required, however, all restored areas shall be smoothly and evenly dressed and sloped to drain.

EP-6. RECORDING AND PRESERVING HISTORICAL AND ARCHEOLOGICAL FINDS. All items having any apparent historical or archeological interest which are discovered in the course of any construction activities shall be carefully preserved. The Contractor shall leave the archeological find undisturbed and shall immediately report the find to the Contracting Officer so that the proper authorities may be notified.

EP-7. PROTECTION OF WATER RESOURCES.

EP-7.1 General. The Contractor shall not pollute streams, lakes or reservoirs with fuels, oils, bitumens, calcium chloride, acids, insecticides, herbicides or other harmful materials. The Contractor shall investigate and comply with all applicable Federal, State, County and Municipal laws concerning pollution of rivers and streams.

EP-7.2 Erosion Control. generally, shall consist of temporary seeding upon completion of work at each site, and upon plowing of temporary access and storage yards when no longer needed.

EP-7.2.1 Temporary Seeding and Protection. The work of temporary seeding and protection of erosive earth areas shall be done promptly at the locations and times directed by the Contracting Officer.

EP-7.2.1.1 Seed Bed Preparation. Areas to be temporarily seeded shall require the preparation of a seed bed only when the soil surface is hard and crusty. Disturbance of the soil surface by whatever means that is practicable such as discing or bulldozing to create a loose and roughened condition capable of retaining the seed and mulch will be required. The preparation of a seed bed will not be required when, in the judgment of the Contracting Officer, the soil surface is in an acceptable condition from the normal grading operations.



EP-7.2.1.2 Fertilizing. All areas to receive temporary seeding shall be fertilized. The fertilizer shall be applied onto the prepared seed bed and need not be incorporated into the soil. The fertilizer shall be applied separately unless hydraulic methods are used, then the fertilizer and seed may be mixed and applied in one operation. Unless otherwise approved, 15-10-10 analysis fertilizer shall be used for temporary seeding at the approximate rate of 12 pounds per 1000 square feet.

EP-7.2.1.3 Seeding. Temporary seeding may be performed at any time during the year as directed by the Contracting Officer, except during the period of 15 October to 1 February. In order to stabilize erodible areas with vegetation through the winter, the seeding must be performed by no later than 15 October.

The seeding shall be made onto a prepared seedbed; however, working the soil surface to cover the seed will not be required. The seeding operation may be combined with the fertilizing operation when hydraulic methods are used.

Only rye grain or perennial ryegrass seed shall be used for temporary seeding. Rye grain (*Secale cereale*) shall be sown at the approximate rate of 2.5 pounds per 1000 square feet during the period of 15 August to 15 October. Perennial ryegrass (*Lolium Perenne*) shall be sown at the approximate rate of 0.8 pound per 1000 square feet during the period of 1 February through 15 October.

EP-7.2.1.4 Protection. All seeded areas shall be promptly protected with a straw mulch. The straw shall be uniformly applied to the seeded areas at the approximate rate of 2 tons per acre and tacked down with 200 gallons of bituminous material per acre.

Areas requiring temporary erosion control measures during the period of 15 October through 31 January, when seeding is not permitted, shall receive only an application of straw mulch held in place with bituminous material. The rate of application of the straw mulch shall be 3 tons per acre and the rate of application of the bituminous material shall be 200 gallons per acre for this type of protection.

EP-7.3 Spillages. Special measures shall be taken to prevent chemicals, fuels, oils, greases, bituminous materials, waste washings, herbicides and insecticides, and concrete drainage from entering public waters.

EP-7.4 Disposal of any materials, wastes, effluents, trash, garbage, oil, grease and chemicals, in areas adjacent to streams shall not be permitted. If any waste material is dumped in unauthorized areas, the Contractor shall remove the material and restore the area to the original condition before being disturbed. If necessary, contaminated ground shall

be excavated, disposed of as directed by the Contracting Officer, and replaced with suitable fill material, compacted and finished with topsoil and planted as required to re-establish vegetation.

**EP-8. DISPOSAL OF CLEARED AND GRUBBED MATERIAL AND OTHER DEBRIS.**

**EP-8.1 General.** All debris resulting from construction operations on this contract may, at the Contractor's option, be disposed of by burning, if permitted, or removal from the site including cutting into pulpwood or chipping prior to removal. The Contractor shall make a reasonable effort to channel materials of value resulting from clearing operations into beneficial use.

**EP-8.2 Burning** shall be subject to current regulations of the Air Pollution Control Commission or Board of the State in which the project is located and local health authorities. Burning operations, if permitted, shall be conducted so as to prevent damage to standing timber or other flammable growth. The Contractor will be responsible for any damage to life and/or property resulting from fires that are started by his employees or as a result of his operations. The Contractor shall furnish at the site of burning operations adequate fire fighting equipment to properly equip his personnel for fighting fires. Fires shall be guarded at all times and shall be under constant surveillance until they have been extinguished.

**EP-8.3 Removal.** The Contractor may elect to remove all debris resulting from contract operations from the site of the work. Such disposal shall comply with all applicable Federal, State, and local laws. The Contractor, may, at his option, retain for his own use or disposal by sale or otherwise any such materials of value. The Government assumes no responsibility for the protection or safekeeping of any materials retained by the Contractor. Such materials shall be removed from the site of the work before the date of completion of the work under these specifications.



**PART II**

**SECTION K**

**Contract Administration Data**

1. Accounting and Appropriation Data: (To be supplied at time of award)

**Administration of Contract**

1. The resulting contract will be administered under the Contracting Officer of the U. S. Army Engineer District, Louisville, except for the following:

(a) Site preparation, erection and testing of buildings at Alum Creek, West Virginia and East Lynn, West Virginia will be administered by the U. S. Army Engineer District, Huntington, West Virginia.

(b) Site preparation, erection and testing of buildings at Youghiogheny, Pennsylvania will be administered by the U. S. Army Engineer District, Pittsburgh, Pennsylvania.

2. The Contracting Officer, U. S. Army Engineer District, Louisville, will appoint appropriate personnel in writing from the Pittsburgh and Huntington Districts as Resident Contracting Officers and/or Contracting Officers' Representatives (COR's) to effect this administration.

**Submission of Invoices: Invoices shall be submitted as follows:**

1) All invoices covering the fabrication & delivery of the buildings will be submitted to the U. S. Army Engineer District, Louisville, Corps of Engineers, PO Box 59, Louisville, Ky 40201.

2) All invoices covering the site preparation, erection and testing of the buildings will be submitted thru the appropriate Resident Contracting Officers and/or Contracting Officers' Representatives (COR's) to the U. S. Army Engineer District, Louisville, Corps of Engineers, PO Box 59, Louisville, Ky 40201.

Solicitation No. DACW27-75-B-0089

**PART III - GENERAL PROVISIONS**

**SECTION L - GENERAL PROVISIONS**

General Provisions (Supply Contract) dated 23 Aug 71, Revised 28 Jul 75 as issued by the Department of the Army, Corps of Engineers, are incorporated herein.

General Provisions (Construction Contract) dated 16 Oct 72, Revised 28 Jul 75 as issued by the Department of the Army, Corps of Engineers are incorporated herein.

Solicitation No.  
DACW27-75-B-0089

PART IV - LIST OF DOCUMENTS AND ATTACHMENTS

SECTION M - LIST OF DOCUMENTS AND ATTACHMENTS

Standard Form 33, Solicitation, Offer and Award, November 1969, 3 pages

Standard Form 33A, Solicitation, Instructions and Conditions, March 69,  
2 pages and continuation Pages C-4 thru C-14

Standard Form 36, Continuation Sheet, July 1966, 2 pages

Genl Prov (Supply) consisting of Index Page L-2 dated 28 Jul 75 and Pages  
L-3, L-4 & L-5 dated 23 Aug 71, L-6 dated 28 Aug 74, L-7 dated 28 Nov 74,  
L-8 dated 29 Feb 72, L-9, L-10 and L-11 dated 27 Nov 74, L-12 dated 28 Aug 74,  
L-13, L-14 and L-15 dated 28 Feb 73, L-16, L-17 dated 28 Aug 74, L-18 dated  
22 Jul 74, L-19 dated 23 Jul 74, L-20, L-21 dated 22 Jul 74, L-22 and  
L-23 dated 28 Jul 75 (22 pages)

Genl Prov (Const) consisting of Index Pages dated 16 Oct 72 & 28 Jul 75,  
Page 1 dated 17 May 74, pages 2 & 3 dated 16 Oct 72, Page 4, dated 27 Sep 72  
page 5 dated 11 Dec 74, page 6 dated 28 Aug 74, pages 7, 8 & 9 dated 17 May 74,  
Pages 10, 11 & 12 dated 28 Aug 74, page 13 and 14 dated 17 May 74, page 15 and  
16 dtd 28 Aug 74, page 17 dated 17 May 74, page 18, 19 & 20 dated 12 Jun 74,  
page 21 dated 11 Dec 74 and Page 22 dated 28 Jul 75 (24 pages)

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